

The BUSINESS EDUCATION WORLD

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ACCOUNTING	Adjustments for Deferred Charges	Howard A. Zacur	214
ARITHMETIC	What To Teach in Business Arithmetic?	R. R. Rosenberg	220
BOOKKEEPING	Bookkeeping Contest Materials	Milton Briggs	234
BOOKKEEPING	The "Why" Approach in Bookkeeping	E. C. McGill	206
BUSINESS ENGLISH	A Note for Job Hunters	Kenneth Baker Horning	196
CLUBS	A Business-Machines Exhibit	Paul H. Seay	200
EQUIPMENT	On the Lookout	Archibald A. Bowle	248
GUIDANCE	Now the Blind Do Office Work Too	Francis M. Andrews	198
HOBBY	"Artying" for Hobbyists	Julius Nelson	218
INSTRUCTION	The Use of the Lesson Plan	Marion M. Lamb	193
JUNIOR BUSINESS	Modern Junior Business Training	Stephen D. Liptak	212
LITERATURE	Book Review: <i>Appraising Business Education</i>	T. Woodward	230
OFFICE MACHINES	Reducing Repetitive-Writing Costs	R. H. Littlefield	190
PROFESSIONAL	Report on Professional News	Educator's Dispatch	223
SALESMANSHIP	What a Sales Class!	Louise Hill Boggess	210
SHORTHAND	Not for Skill Alone	Emily Ziegler	217
SHORTHAND	Shorthand Dictation Materials	The Gregg Writer	238
TEACHING AIDS	Christmas Classroom	Rida Duckwall and E. W. Alexander	208
TRANSCRIPTION	Achievement Certificates for Students	Claudia Garvey	236
TYPEWRITING	Eyes on the Copy	Harold J. Jones	215
TYPEWRITING	Unarranged Tabulations Are Out	Clyde I. Blanchard	202

Vol. XXVII

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Appointments, 227; Organizations, 224; NBTA Convention, 225; People, 228
Research Relatives, 205; Audio-Visual Aids, 229; Wits and Wags, 239

DECEMBER

1946

Business Principles For Consumer and Producer FUNCTIONS OF BUSINESS

By Jones, Tonne, and Price

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Functions of Business is designed to help you prepare better workers and better consumers. It is written in such a way that you can give definite emphasis in the same course to both the consumer and the producer phases of business education.

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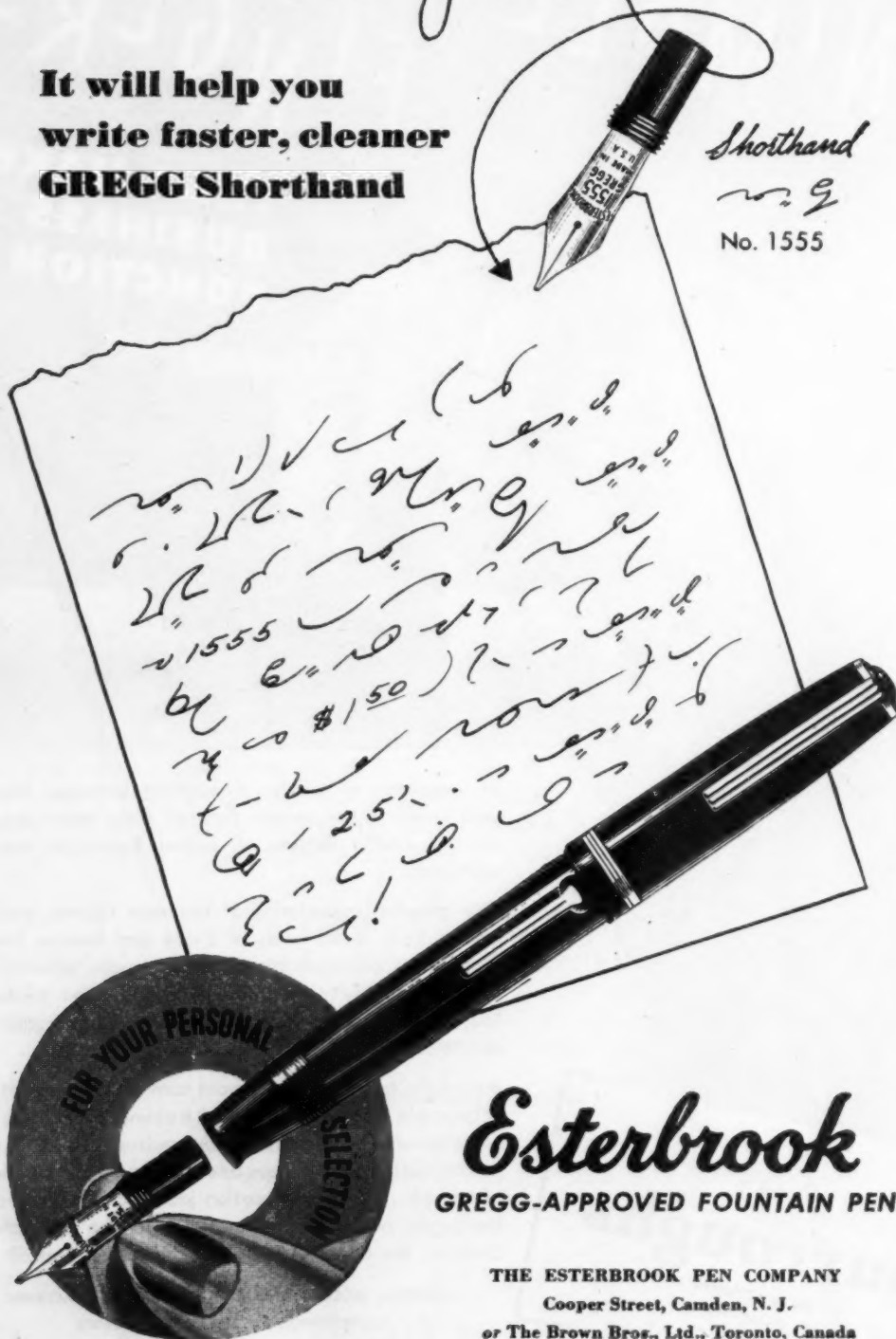
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The BUSINESS EDUCATION WORLD

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Tinkering Refused

Dear Mr. X:

Thank you for describing the situation in your school. The refusal of your department head to let you experiment in your beginning shorthand class must have been disturbing to you; we all like to experiment. The search for better and easier teaching is one that all teachers share. Short cuts, stunts, incentives, projects, grade scales, devices—these are what we all want and receive in conventions, literature, methods courses, teacher's manuals. The quest for fundamental fact is the heart of research. In wishing to try a new approach, you exhibit a natural professional feeling.

Indeed, so popular has experimentation become that the orthodox hard-drilling teacher is almost in hiding these days. We are all so imbued with the research spirit that the teacher who is not "trying out an idea" scarcely dares admit the fact!

But, Mr. X, there is a difference between research and tinkering. *Research* is carefully planned, is administered under controlled circumstances by experts of long study and experience. *Tinkering* occurs haphazardly, is a momentary toy. So long as it does not upset the psychological patterns known to guarantee pupil progress, some tinkering helps professional growth and gives variety; but some kinds of tinkering may be hazardous to pupil welfare.

It is dangerous for Miss Smith, who reads that employers do not dictate smoothly, to let her shorthand beginners do her dictating. It is fatal for Mr. Evans, on learning that a local employer gives 30-minute employment tests, to crush his typing beginners

OUT OF THIS



WORLD

In a hurry? Well, no matter how little time you have for reading this issue of the B.E.W., you won't want to miss:

☐ What to do on the last day before the Christmas holidays in your shorthand, typing, and duplicating classes. *Page 208*

☐ How to use the goldmine in want-ad columns—good for a homeroom program, too! *Page 232*

☐ A brand new idea for a club meeting: miniature convention exhibit of office equipment. *Page 200*

☐ Who's to be Who at the NBTA Christmas time convention. *Page 225*

☐ The criticism of unarranged tabulations by business workers. (A riot act will occur among typing teachers when they read this!) *Page 202*

☐ Artyper (guest hobbyist) Julius Nelson's confession that he hit the period 5,000 times just to artype his own photograph. *Page 218*

☐ Jane Wilson's explosive teaching experiences as a salesmanship teacher. *Page 210*

☐ The Professional Awareness exam that will tell you whether or not you need to read the A.B.E. 1946 Yearbook. *Page 230*

under timings of that length. It is outrageous for Miss Jones, who suspects all advertisements, to make her business-English students compose misleading reply letters. Mr. Oscar should lose his position as principal when he blithely tells his fellow Rotarians that his office-practice class will address their 20,000 envelopes "for the experience."

A disturbing factor in such tinkering is that our enthusiasm, supported by temporary student interest, sometimes obtains results that we attribute to the device rather than to our enthusiasm. If we gave as much attention to regular lessons as we do to pet schemes, we might achieve double what we do, because we have augmented rather than interrupted the orderly learning process.

Mr. X, you may be certain that you can justify substituting your experiment for the program carefully compounded and developed by the authors of your textbooks. Your first task, then, is to convince your department head (who probably knows the proved value of your textbook) that you are truly experimenting, and not simply tinkering.



What Next?

They Reach the Top A New School

CLYDE I. BLANCHARD

THEY ALL REACH THE TOP • "There are many trails up the mountain, but in time they all reach the top." Natany, the Navaho shaman, was trying to clarify the confused thinking of his tribe regarding the conflicting religious beliefs and practices of the white race.

I often thought of his simple explanation this summer as I listened to methods instructors making contradictory statements to summer-session students. For example—

"Reading must precede writing." "Writing must precede reading."

"Test your students as little as possible." "Test your student at least once a week. A short daily test is often very helpful."

"Don't correct a single paper. Let your students make mistakes; they aren't learning unless they make mistakes." "Correct

enough papers so that you know what mistakes your students are making and can give each one the help he needs."

"Don't teach erasing at all during the first semester." "Teach erasing early so that the students can apply their skill to practical typing jobs."

"Don't start transcribing until the student can write shorthand at 60 words a minute and type at 40 words a minute."

"Teach shorthand by the transcription method. Have them transcribe immediately—in longhand if they can't type."

"Don't permit your students to consult the dictionary when transcribing. If they don't know how to spell a word, let them misspell it." "Permit your students to consult the dictionary when transcribing, but warn them that it is a costly habit."

These and many other conflicting statements came from men and women who are nationally recognized as successful business teachers. They all used almost the same references to books on psychology and pedagogy to support their statements. And they all have reached the top in their own way.

THINKOGRAM • "Flattery is nothing but soft soap and soft soap is 90 per cent lye."

A NEW TYPE OF SCHOOL • The *New York Herald Tribune* recently carried a story about the opening of a new school in Washington, Connecticut, where sixty boys will be educated for present-day life by living and studying for two-week periods with international leaders in business, education, science, and politics.

Fourteen leaders in various fields have volunteered to spend two weeks on the campus "holding informal seminars, taking over key classes, chatting with the boys about vocational and educational interests, and going fishing and hiking with them."

Among the men will be Senator Elbert D. Thomas, of Utah; Joseph W. Frazer, President of the Kaiser-Frazer Corporation; Dr. Harvey Fletcher, of the Bell Telephone Laboratories; and Dr. Vannevar Bush, Director of the Office of Scientific Research and Development.

It has long been the custom of business teachers to bring into the classroom leading businessmen and women of their community for inspiring and factual talks on various phases of business. The plan set up by the board of directors of this boys' school is a more serious and more fruitful expansion of this idea and should stimulate business educators to enlarge this phase of business participation to the maximum.

We are sure that a considerable extension of the idea is possible even under the restrictive conditions that exist in the average business-department setup.

IN WORLDS



TO COME

STARTING WRITE • The 1947 issues of the B.E.W. promise so many good things that the cover is just about bursting its staples. Watch for:

JOIN THE JURY • This is something *really* new: a verbatim report of a panel discussion among the B.E.W. staff and guest business educators. Each trial is on a different topic. Speakers offer evidence. And you will win cash prizes for rendering the verdict.

PROOFREADING • Hurrah, the pre-war World's Worst Transcript comes back to the pages of the B.E.W.! Starting in January, each issue will have a you - can't - find - all - the - errors transcript as a new addition to the Professional Services section. Yes, reprints will be available for your class.

BUSINESS PRACTICE • The first-hand reports of What Goes on in Business, inaugurated in this issue (page 190) will be continued. Coming up: Typewriters that think, postal meters, office keyboards, and many, many others.

SERIES • Business arithmetic, by Rosenberg; typing, by Mrs. Humphreys; typing teaching, Smith; transcription, Rowe.

IN 1947!

The Machine Method of Reducing Repetitive

A MERICAN business today is controlled by business forms. Regardless of the functions they serve, they all have one common factor—copy work. Names, addresses, serial numbers, deductions, due dates—innumerable items, depending on the nature of the business—are required over and over again. Actually, studies show that, of all data written on business forms, an average of 65 per cent is repetitive.

Filling in data on forms is a principal clerical task in a business organization. Because forms serve to guide action but do not perform the action, copy work is a nonproductive expense. The time and the man power devoted to this task are a constant overhead expense in operating a business. When inaccuracies creep in to complicate the copying, the expense becomes staggering.

What goes on in business, you ask? Business constantly seeks methods to reduce the cost and to guarantee the accuracy of clerical copy work.

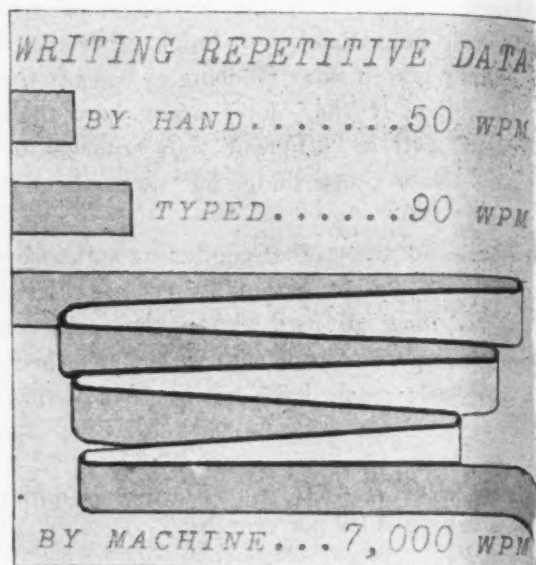
The Speed Factor

There are three basic methods of writing data on business forms—by hand, with the typewriter, and by machine reproduction.

With pen or pencil, only a portion of a single character is written with one motion. A steady production of 50 words a minute is unusually good, as anyone who has tried to make a few extra dollars by addressing envelopes can tell you.

The invention of the typewriter was a tremendous stride forward, obviously, as an entire character is formed with each stroke instead of a part of a character as in handwriting. But even on a typewriter, 90 words a minute may be considered top commercial

R. H. LITTLEFIELD
Addressograph-Multigraph Corporation



speed in writing mixed letters and numbers in various positions on forms that must be handled individually.

The third method is that of high-speed machine reproduction. The data to be repeated are embossed on indestructible metal plates, which in turn are filed in steel filing drawers. Instantly available, the plates may be placed, a drawerful at a time, in machines that automatically feed plates and forms and print the embossed data on the forms at the rate of 100 a minute. As each plate record may contain as many as 360 characters, the potential writing speed of these machines is 36,000 characters, or over 7,000 words, a minute. What goes on in business? More and more machine reproduction of copy work.

The Accuracy Factor

Writing routine repetitive data by hand or typewriter is a tedious and tiresome task; it is little wonder that work of this nature invites errors. Clerks handling copy work reach a fatigue point much faster than do those dealing with creative or variable information. In an endeavor to short-cut these tedious, eyestraining tasks, clerks often inject



What Goes on in Business?

B.E.W. Special Feature

Writing Costs

their own abbreviations, deletions, and editing into the work being copied. In addition, they too often rely upon their memory. Individual handwriting is often illegible and difficult of accurate interpretation; and typewriting, although legible, offers possibilities for inaccuracy, as every typing teacher knows.

There is no such thing as a costless error. It has been estimated that for every dollar spent for manually transcribed data, an additional 50 to 85 cents is spent for checking—errors or no errors—each time the copy work is repeated. The opportunity for error that exists in any manual method is an opportunity that may be costly to business.

On the other hand, an embossed data plate used in machine copying, once verified, will reproduce itself with infallible accuracy forever. All chance for omissions, transpositions, or errors are eliminated. Every record written from the plate is uniformly and invariably accurate. Little wonder then that business is adopting machine writing methods.

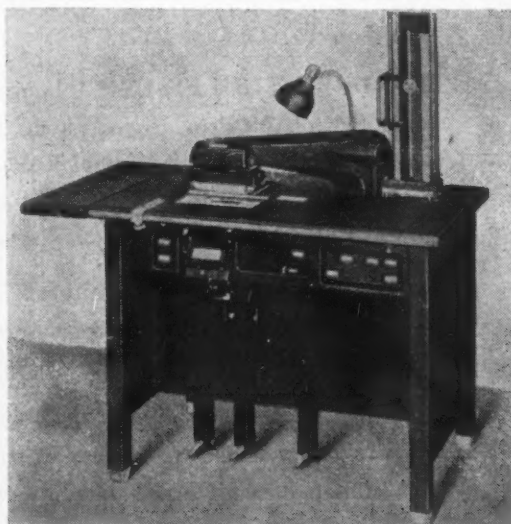
Other Factors

Because of the universal acceptance of these modern machine methods, your business students will see such machines handling a wide variety of forms in the offices into which they go. Originally used for straight addressing work, such as magazine-subscription and direct-mail lists, through broad developments in machines and machine attachments, they now are used for thousands of purposes. A typical illustration of the flexibility available is the automatic selector device. The embossed plates are provided with sockets into which may be inserted classification tabs. These may be colored or plain. As many as sixty primary classifications may be used. By using combinations of these sixty basic positions, a virtually unlimited classification scheme is available. Plates may be classified by age, sex, financial status, and so on. Machines may be equipped with attachments to expedite the handling of a wide variety of forms, such as bank checks, statements, invoices, shipping labels, routing forms, insur-



THE ADDRESSOGRAPH PROCESS

1. Using the embossing (metal-stamping) Graphotype machine shown above, type on a light metal plate the data to be repeated.
2. Proofread for accuracy.
3. File in steel cabinet.
4. Insert plates, a drawerful at a time, in the Addressograph machine shown below.
5. Push a button, step on a pedal, and reproduce the plates on hand- or on machine-fed forms at the rate of 100 a minute.



Photos courtesy of Addressograph Corp.

ance-premium notices, and many other kinds of copy work.

The efficiency of the embossed metal-plate method of writing repetitive data is illustrated in the office work of life insurance companies. The basic filing is numerically by policy number. Premium notices, however, are prepared either quarterly, semiannually, or annually. Plates then are "tabbed" to indicate the specific due date for each policyholder. Plates are filed numerically without regard for due dates. Each month all plates are placed in the machines, which have been set to print only those plates representing premium notices due that particular month. Those not yet due pass the printing position automatically. Regardless of whether the plates print or not, they refile themselves in the original filing drawer and in their original sequence—at the rate of 100 plates a minute. There is no error. The embossed data, such as name, address, premium due, policy-number, office to be credited, and the like, are reproduced with infallible accuracy.

Opportunity

Because so many businesses have already adopted machine reproduction of repetitive data (over 3,000 types of business as well as city, county, state, and Federal Government agencies), and because so many more will do so in the future, it is important for business

students to realize that considerable opportunity exists for those who are familiar with embossing and addressing machines. The equipment is so simple to use that operators, as a rule, may be trained on the job in a few hours. The student who is trained in school, however, will command a higher initial salary and will soon have a wider understanding of applications than will the operator whose experience is limited to that of the office in which he is trained.

For the commercial student with excellent typing skill, positions as graphotype operators are readily available. The graphotype machine, which embosses the metal plates, is equipped with a standard typewriter keyboard. After a brief operating period, typists acquire high production speeds. "Graphotype Operator" is a standard job classification in both industry and governmental service, and standard civil-service ratings for this classification have been established. Graphotyping pays well, too, as many operators are paid bonuses for high-speed production. In addition to being a career in its own right, graphotyping, like the operation of the addressing machine, is a key to the opportunity of becoming a specialist on business procedures and clerical economies.

Business is adopting the machine method of reducing clerical costs on a constantly broadening scale, and teachers and administrators will note a growing demand for operators.



GLIMPSES OF POSSIBILITIES • Thousands of students annually attend the Central Evening High School, of Providence, Rhode Island, to enjoy a tuition-free opportunity to finish interrupted junior and senior high school educations, to earn diplomas, to train or retrain for jobs, to pursue hobbies, or just simply to learn. Last year 1,302 students (average age, twenty-five) attended, 264 of whom were veterans. Diplomas were awarded to 36.

Attendance is remarkably faithful. During the past year, one student completed seventeen years of perfect attendance; others completed records of twelve, seven, and five years. Shorthand and typing are the most popular subjects of the 71 offered.

Human interest stories spur the staff: the girl who studied home-nursing and laboratory work to become head technician in a city hospital; the elevator operator who became a bank clerk; the widow and daughter who graduated together.

The founders little thought, when they started the evening school back in 1874, that Central would grow and serve as it has.—*Frederick E. Hawkins, Principal.*

The Use of the Lesson Plan

DR. MARION M. LAMB

West Liberty State Teachers College
West Liberty, West Virginia

TO MAKE a lesson plan is in itself a desirable activity, for in making the plan the teacher clarifies and organizes his own thinking about the main objectives of the lesson and the procedures to be used in reaching those objectives. If the plan is to fulfill its purpose, however, it must be used and used intelligently.

While it is true that the plan of a lesson should guide rather than control a teacher's activities, it is equally true that a good plan followed faithfully and skillfully saves the time and effort of the students and the teacher. Moreover, after a plan has been used once, it should be saved

for future reference with annotations as to its effectiveness, the time required by the class to perform tasks included in the plan, description and evaluation of any special projects, errors most frequently made, and suggestions for revision of the plan before it is used again. Plans so annotated and revised present in useful, organized form the accumulated information and skill of the teacher.

Principles applying to the use of the lesson plan may be reduced to a five-step formula:

Step 1. Make the lesson plan in detail for permanent reference. Condense this plan to a few key words on a card for classroom reference.

Plans for permanent reference should be placed in a loose-leaf notebook devoted to each course. A good grade of notebook paper should be used, so that notations and suggestions for revision may be made on the back of each page. Additional sheets are inserted in the notebook as the teacher supplements plans with additional teaching materials, bibliographies, sample tests, and so on.

Because it is difficult to use a detailed lesson plan in the classroom without diverting

the attention of the class from the lesson to the lesson plan, the original plan should be condensed to a palm-size card; this the teacher may use to remind him of the various steps of the lesson. Some teachers condense each notation on this card to a single letter of the alphabet to suggest the step.

Actually, the teacher should know the plan in order to use it to best advantage. If he knows the plan and is further bolstered by a card listing briefly the steps of the lesson,

he is free from undue concern about his teaching activities and can concentrate upon pupil learning activities. The teacher who is confused and uncertain

about teaching procedures cannot give adequate attention to the pupils. Needless to say, attention to pupils, rather than to methods and materials, is the first essential for the success of the lesson.

Step 2. Follow the plan as closely and skillfully as possible.

Sometimes it is advisable to forget a plan temporarily or, in fact, to abandon it altogether. A learning difficulty experienced by the majority of the class may require immediate attention. Sometimes a student offers a contribution, that the teacher believes to be significant to the group; and he, therefore, encourages the student to recount his experience in full. Such occurrences, however, are exceptions that prove the soundness of the rule that a lesson plan should be a good plan and that it should be followed. A good lesson plan, like a good budget, is flexible enough to permit minor deviations, but tight enough to prevent prodigal waste.

Any teacher who doubts the wisdom of the principle that the lesson plan should be followed is advised to look back to his own high school days, when he and his class-



Campus view of the West Liberty (West Virginia) State Teachers College. The building in the rear houses the classrooms of the Business Education Department, headed by the author, Dr. Marion Lamb. The college is located between Pittsburgh and Wheeling.

mates (his classmates, at least) took pride in getting the teacher "off the subject." How well they knew just which topics would lead each teacher away from the lesson! In looking back to those days, one teacher at least suspects that her teachers were just as happy as the students to leave the precision of geometry and English composition for general discussion of the eternal verities, world problems, life in China, or whatever. Interesting and stimulating though such digressions may be, they are not a direct route to vocational proficiency.

A good plan may be ruined by too many or too long digressions, and it may also be ruined by lack of teaching skill. We speak of using a plan as one might speak of using an umbrella, but unfortunately the teacher needs teaching skill in order to use a plan effectively. In the lesson plan, materials and methods are integrated into procedures planned to produce the desired results (the objectives); but these procedures will produce those results only if the teacher understands the human beings with whom he is working and is able to make them participate wholeheartedly in the activities prescribed in the plan. Effective use of lesson plans implies rapport and co-operation between the teacher and the group, for the pupils also must use the plan by following it under the direction of the teacher. Effective use of plans also implies knowledge of teaching and classroom-management techniques.

Following are some specific teaching and

management faults that will weaken the best lesson plans and perhaps defeat them altogether:

1. An undesirable learning situation makes concentration difficult. The room may need ventilation. The room may be too hot or too cold for human comfort. Furniture and equipment may be arranged so that students suffer from the glare of too much sunlight or from lack of sunlight. Students may not be seated according to a desirable plan. Noises from the street or from adjacent rooms may be distracting the attention of students from their work.

2. Time-wasting attention is devoted to the learning difficulties of one or two students while the rest of the group waits. Only group problems should be handled in group sessions.

3. The teacher fails to pace lessons at a rate that challenges the class and requires pupils to make an effort to "keep up with the teacher."

4. The teacher fails to call upon students according to their ability to contribute to the class. Due regard must always be given to the following principles:

- a. All students should participate in every lesson.

- b. Bright students should be called upon to recite while learning is taking place, so that slow students may learn from the bright ones.

- c. The teacher checks the learning of the group by calling upon dull students. The teacher knows that if the slow students have grasped the new material, the brighter students will certainly have learned it. This method of checking learning must, however, be varied often enough so that it is not obvious to the group.

5. The teacher forgets the importance of a word of praise and recognition in maintaining the student's interest in his own progress and his desire to improve. If the student does not wish to improve, no lesson plan can make him improve.

6. The teacher does not make proper homework assignments. Students must know what they are to do and how they are to do it in order to make adequate preparation for the next day's lesson. If adequate preparation is not made, the lesson plan based on that preparation will not be successful.

7. The teacher fails to keep an accurate check on student work. A teacher should know who is doing homework and who is not doing homework, who is improving through classwork and who is not improving through classwork, and the approximate degree of progress achieved by each pupil. There are few incentives as powerful to students as the knowledge that the teacher is aware of the quality, or lack of quality, of their daily work.

8. Inefficient classroom organization fails to safeguard the class from interruption. When the teacher answers every knock at the door, consults with every pupil who wishes to leave the room, and so on, attention of the class cannot be concentrated on the lesson.

9. Students are allowed to divert the attention of the group by misconduct or by unnecessary questions or comments.

10. The teacher digresses from the subject. Good plans are useless in the hands of the teacher who turns the class period into a general discussion period or into a monologue on personal affairs and personal opinions.

This is a partial list of weaknesses that can defeat good lesson plans. A long list of unfortunate personal attributes of the teacher—bad speech habits, sarcasm, favoritism, and so forth—could be added, for they arouse emotional reactions that impede learning. However, consideration of personal attributes of the teacher is implied in the earlier statement that there must be a spirit of understanding and co-operation between the group and the teacher.

In short, execution of a good lesson plan calls not only for mastery of the methods and materials outlined in the plan, but it also requires an understanding of students, an ability to direct their learning, a mastery of teaching techniques, and the thoroughness necessary to

follow through by checking the results of each lesson.

Step 3. Keep a record of the quantity and quality of work produced according to a lesson plan.

A record of the results achieved through the use of the plan not only provides a basis of comparison for future efforts—taking into account variable factors such as differences in ability of groups, differences in learning situation, and the like—but also provides a tentative basis for classroom standards. For example, a typewriting teacher may wonder how much time should be allotted for a first effort in cutting a stencil (common matter to be copied from simple rough draft, to be double spaced, margins specified). What should be the time goal established for ultimate performance of the job? Business-education literature has little information to offer on quantity-quality standards, and consequently a teacher will find it to his advantage to record results achieved by classes in performing various tasks and to formulate classroom standards from those results.

Step 4. Evaluate each lesson plan, making notations as to weaknesses and errors in the plan.

Evaluation of a plan must be made in terms of the stated objective or objectives of the plan. The question must be answered: did the class reach the predetermined goals, or did the group, for some reason, fall short of the mark?

The teacher should not assume that failure to reach the desired goals was necessarily due to poor planning. The teacher may say, "I should have allowed more time for that part of the lesson," whereas the fact is that he allotted the right amount of time to the activity, but wasted part of that time in digressions and slow pacing of procedures. In other words, the class may have failed to attain the desired objectives, not because of weaknesses in the plan, but because of the teacher's lack of skill in using the plan.

Student reaction should also be considered in evaluating plans. The degree of interest engendered and maintained during the lesson is reflected in accomplishment, it is true; but on the other hand there are several roads to most objectives, and it is desirable to know which roads are preferred by travelers and why.



Dr. Marion M. Lamb, professor of Business Education at the West Liberty (W. Va.) Teachers College, brings us the fourth in the current B.E.W. series on techniques of lesson planning.

Step 5. *Revise plans from year to year so that objectives, materials, and procedures are up to date.*

If a teacher keeps his lesson plans for each course in a separate notebook reserved for that course, he will find it easy to classify and conserve for convenient use the clippings and circulars about new books and pamphlets, bibliographies of teaching aids, information about sources of materials, published tests, and all other materials relating to each course he teaches. Such materials should comprise a reference section in the appropriate notebooks. Then, when a teacher reviews his lesson plans for a course, he can use this reference section as a first guide in the revision of plans.

THIS five-step formula on the use of lesson plans is recurrent; that is, after step 5 the teacher returns to step 1 and follows through the five steps in a continuing cycle of improvement of lesson plans by their intelligent use and critical evaluation.

To the beginning teacher, this varied and rather exhaustive use of lesson plans may seem to be unnecessarily tedious, but it will not seem so to any teacher who has ever taught without adequate organization of materials and methods and without adequate record of the results of daily classroom work (the voice of experience). The teacher who starts each course from no predetermined point (other than Chapter I of the textbook) and travels he knows not how far with the class is likely to have a misty recollection of each step of the journey; consequently, as he wanders over the same ground year after year, he is forever a stranger in a strange land, exposed each time to the same hazards and trapped by the same pitfalls. A happier experience is enjoyed by the teacher who keeps a daily record of each year's journey.

In responsible activity the importance of recorded plans is recognized, and the results achieved through the use of those plans are measured as accurately as possible. Results are improved through the improvement of planning and through improved use of plans. So it should be in teaching. The teacher should "plan his work and work his plan," striving always to improve the results of his teaching through improved planning and through the improved use of plans.

A NOTE FOR JOB HUNTERS

KENNETH BAKER HORNING

The University of Oklahoma
Norman, Oklahoma

MOST teachers of business writing stress the application letter because it is the one type of letter for which every student will have immediate use. But too many of these teachers stop with the routine letter that they hope will result in an application form, an interview, or an actual position. But consider, now, the follow-up to that original letter. I have seen numerous instances where the position was obtained *primarily* because of the follow-up letter. This is not to say that the original letter is unimportant; it still plays a very important role. Often, however, this second letter adds just the right final touch.

Consider the Application Follow-Up

The main reason a follow-up may be successful, of course, is that so few people write one. If a personnel man receives 50 letters in a set period of time and sends routine we'll-keep-you-informed replies to all 50, probably 49 of those receiving these replies will let the matter rest. But one alert person will immediately send a brief note, needing no reply, to thank the personnel man for his consideration and to repeat the writer's desire to work for this particular company. Then, a month or two later, a second follow-up would not be amiss. It should be a brief note mentioning that he is still especially interested in this company and adding a point he did not mention in his first letter—perhaps a bit of background purposely omitted from the original letter for this very purpose. It might be something that has happened since the first letter was written: the applicant might have enrolled in a course he feels would be of special help in this position; he might have read an interesting article or item in the paper about this com-



"So when I didn't hear from you after 14 application letters, Mr. Busbee, I knew I'd have to see you to convince you."

pany; he might have talked to some employees of the company and now be even more enthusiastic about the firm.

Even if the personnel manager is not especially enthusiastic about your follow-up at the time, it may have a positive effect later. Someday he will review his files, to see whom he will get to fill a particular vacancy. When he notes that 49 of his prospects wrote one letter, but that one prospect has written two more brief notes expressing his continued interest in the company, the effect is obvious.

One very special type of follow-up is that which must be written when no reply is received to the original letter of application. Often the applicant is sincerely interested in this particular company; so, he *wants* to send another letter; but the company already has all the details in his first letter. What can he say in this second letter that will not show annoyance because the company did not reply? Here is one letter that did a good job of that problem in a rather conventional, but still effective, manner:

Dear Mr. Carpenter:

On July 25 I sent you a letter of application for a position as meteorologist with Pan-American Air Lines in Belem, Brazil.

As I have not received a reply, I thought it possible that the original letter might have been

lost in the mail; for this reason I am enclosing a duplicate copy.

In order to become even better qualified for the position, I am at present enrolled in a course, "The Use of Radiosonde in Forecasting Tropical Weather," at the University of Chicago. This course gives the latest theory on weather forecasting in tropical regions.

I shall certainly appreciate your consideration of my training and experience. I can start work at any time.

Here is a briefer, franker letter that was just as effective:

Dear Mr. Jones:

Do you recall your first position in the business world after your graduation from college? Can you picture yourself a few years back as the young college graduate—eager and anxious for his first start? Well, that is the position I am in right now.

You have my letter of application. My college work is completed, and I am prepared for my start in the business world. A position with your company is my goal. May I have that opportunity, Mr. Jones?

Humor in letters of this type can be quite dangerous unless the writer is especially capable. Here is a letter that solved the problem with a humorous approach:

Dear Mr. Adams:

I feel like the optimist who fell out of a fourteen-story building. As he plummeted past the fourth floor, a witness heard him shout, "Well, nothing's happened yet!"

Well, something has happened—and I have been wondering whether it happened to me or my letter. It is three weeks since I applied for the position of statistician in your office.

"How can I best serve Adams Petroleum Company?" is the question that determined my whole program of preparation; that is why I am so eager to remove any obstacle that may have arisen.

Perhaps you would tell me what to do next...?

EACH of these three letters was successful in getting the prospective employer seriously to consider the applicant. They are examples of follow-ups that can be used in a particular instance; there are numerous other times when follow-ups would be in order.

One word of warning: don't overdo it. Don't pester the company with numerous letters. Make it obvious in each of the carefully written follow-ups you send that normally no reply is expected.

It is not just a matter of opinion, but an actual fact shown by actual experience, that you can obtain better jobs through better follow-up letters.

Now the Blind Do

FRANCIS M. ANDREWS

Superintendent

The Maryland School for the Blind

Reprinted from

Systems Magazine



Clarice Rothe, a student at the Maryland School for the Blind, studying the brailled text of *Progressive Indexing and Filing*. Miss Rothe can "read" with her fingers as fast as the average person can with his or her eyes.



Here is Miss Rothe putting to practical use the filing training she has received. She has typed as well as brailled her cards so that a seeing person will also be able to use her file.

THOUSANDS of boys and girls have returned to high schools and colleges. Among them are a small percentage of handicapped youth—the deaf, the crippled, and the blind. They have the courage to overcome their handicaps and to take their places in the world. They do not want sympathy or sentimentality. What they do want is the chance, first, to acquire a normal education and then to use it on competitive terms with the people who are fortunate enough not to share their handicaps. All they want is an even break with normal people.

To be sure, some of them need special education. In the case of the blind, their education is received mostly in special state or private schools for the blind. These schools are equipped to give the blind student as fine an education as his seeing brothers and sisters.

The Maryland School for the Blind, in Overlea, Maryland, has an unique arrangement with the high schools of the City of Baltimore. Its more promising pupils attend the public schools for their last two years of secondary education. This brings them into direct contact and competition with normal pupils—which is good for the blind who must learn to live in a seeing world. Here they have the same opportunity to elect various courses that the seeing pupils have. They are held to the same standards and required to do the same work as pupils who can see—and they meet the test.

The only concession they need, want, or expect is the use of Braille. The high school texts they need are transcribed into Braille so that they have at their finger tips texts identical with those before the eyes of seeing pupils. Reading with their fingers, they absorb the same information that other students acquire visually, and they retain it as well as or better than those students do.

Office Work Too

Henry Ford, who is unquestionably a realistic and successful industrialist, has conclusively proved that the blind and otherwise handicapped can do a full day's work for a day's pay in many jobs, and can often outperform normal workers on identical work.

What is not generally known to the public at large is that the blind can and do make excellent office workers. They can and do perform all office operations in which sight is not *indispensable*, and the list of such operations is much longer than one might suspect. Type writers, Dictaphones, calculating machines of the type that print results, switchboards, and many other office devices can be operated by touch and the properly trained blind operate all of them efficiently.

At the Maryland School for the Blind, students receive instruction in typing for at least three years. If they show proficiency and have a desire to do office work, they are given courses in Dictaphone operation, switchboard operation, business English, office practice, and the rest of the business curriculum. One of the important office operations is filing and locating material.

Progressive Indexing and Filing, published by Remington Rand Inc., has been transcribed into Braille, so that blind persons now have literally at their finger tips authentic information on filing.

Not only blind office workers and commercial students but also blind persons in many other kinds of work need guidance on filing systems and methods. Blind osteopaths, lawyers, students, piano tuners, merchants, and many others need the accurate and scientific information available to them.

Blind veterans share the desire of all veterans to return to civil life and to make their own way in their communities. It is only reasonable that some of them will find *Progressive Indexing and Filing* an open road to filing information. Braille gives them a means of filing and locating documents that their fellow workers can identify by conventional written, printed, or typed notations, so that as office workers they are not barred from this important filing and finding operation.

Blind office workers know that they cannot afford to be average. They dare not make mistakes. What they do, they realize, must be done superlatively well. The blind recognize that merely to do as well as a mediocre sighted worker will not hold the job. They also know that sighted people too often regard them with mingled pity and repugnance, or, if that be too strong a word, reluctance to give them opportunities for which they are well qualified. Consequently, to a blind office worker, a job possesses a value and an importance far greater than that which a sighted worker would ordinarily attach to a like position. Only as the business community becomes aware of the strides being made by such educational institutions as the Maryland School for the Blind, in conjunction with publishers of basic business texts, in training and equipping the blind for business careers can such handicapped persons find deserved—not made work or charitable—openings to employ their abilities.

Properly trained, carefully chosen, well-recommended graduates of schools for the handicapped can and do make valuable staff members for business organizations, provided that they are chosen for specific jobs with the same care that is given to the selection of normal persons and that on the job they are given complete equality of treatment. The handicapped are not inferiors or members of a lesser breed. Treated like human beings who have certain capacities, they respond like normal people. Their pride, ambition, self-respect, and other human qualities are not weakened or destroyed by their handicaps. Often, on the contrary, the very struggle that they have made to compensate for this handicap enhances their will to succeed and their determination to make good. They resent, quite properly, sentimentality and maudlin sympathy or ostentatious consideration.

Given a job to do that does not require the faculty they obviously lack, the handicapped—including the blind—usually distinguish themselves for thorough and conscientious performance that meets or exceeds the standards set.

A Business-Machines Exhibit

PAUL H. SEAY
Withrow High School
Cincinnati, Ohio

ONE OF the most attractive programs our school commercial club has offered was the exhibit of business machines it sponsored last spring. From what was learned in preparing and producing the program, and the amount of interest shown by pupils and teachers, it would seem worth while to plan for something similar this year. Perhaps other clubs and their sponsors would be interested in this type of program.

First, a word about the club itself:

Our club is new; it is just a year old. The teachers of our Business Department assisted in its promotion. Despite the fact that membership is limited to pupils in the business classes of the upper three years of the high school, the club is quite large.

Its name, Beta Chi Business Club, was selected by the students. The initials of the prosaic part of the name, Business Club, were given their Greek names, Beta Chi, thus adding a certain sales appeal.

A steering committee prepared a list of subjects to be worked on by committees. Each member of the club was given a copy of this list and was asked to indicate the committee on which he would be willing to serve.

Each committee was assigned a month in which to present a program. There were enough committees to provide a program for each month, so that no group had to be responsible for more than one month's program.

OUR miniature convention exhibit of thirty office machines, following a brief business session of the club, was one such committee program. Nine classrooms were used in which to present the exhibits. As far as possible machines of a similar nature were shown in the same room, so that they could be compared by the visitors. In this way every member and visitor had ample opportunity to see and hear demonstrations and to ask questions freely.

While some members of the committee served as demonstrators, others acted as guides, escorting small groups of the visitors from the room where a preliminary business session was held to each room in which a demonstration was to be given. The guide distributed to each visitor a five-page booklet (note illustration) containing a list of the rooms in which the exhibits were on display; the names of the machines in each room, with the names of the committee members who were to demonstrate each machine; the name of the chairman of the program committee; the names of the advisers of the committee; an alphabetic list of the committeemen guides and artists; and a list of the advertisers.

A few words here about the program itself.

It was attractively bound in colored paper of suitable weight, obtained from the printing department of the school. The sheets were cut to measure 12 by 3¼ inches and, when folded, made a cover measuring 6 by 3¼ inches. Ordinary duplicating paper, cut to fit into the cover, was used for the inside pages of the program. The pages were fastened into the cover with staples, using a deep-throated stapler. The cover carried a monogram composed of the Greek letters, *BX*, with "Beta Chi Business Club * Program * April 14, 1946," appearing just below the monogram. The booklet was produced on a post-card duplicator.

The student who was responsible for the preparation of the booklet said, "No one will ever know how much work went into the preparation of the booklet." She had learned something of the work and responsibility required to complete what had seemed in the beginning to be a very simple task.

Room	Machine	Demonstrator
126	Beck Speedograph Duplicator	Ursula Hopkins
	Ditto Rotary Duplicator	Dorothy Weinberg
	Standard Fluid Process Duplicator	Marian Boulmer
	Todd Checkwriter and Signer	Shirley Mason
126A	Burroughs Posting Machine	Anna Mae Hiceman
	Sundstrand Posting Machine	Pet Nala
128	Comptometer-Electric	Joan Mahne
	Comptometer-Hand	Ann Mallin
128A	Allen Wales Adding Machine)	Mary Humble
	Burroughs Add-List Machine)	

- *Will click with your club*
- *Will boost the department*
- *Will teach students a lot more than you'd think*

Most of the members of the committee whose responsibility it was to demonstrate machines had received instruction on them in the office-practice classes.

The demonstrators of the gelatin and fluid-process duplicators asked the visitors to write their names on certain places on a sheet of paper with the aid of duplicating carbon. Then the demonstrator made copies of these signatures on the duplicator being demonstrated and cut them apart and distributed them to the writers as souvenirs.

Every visitor to the room where the shorthand and the transcribing-machine demonstrations were presented received his name written in shorthand on a calling card. This proved to be interesting to those who did not know shorthand and gave them a unique souvenir to take with them.

IN PLANNING the exhibit, we wrote letters to the local representatives of manufacturers whose machines were used in the school and were to be demonstrated. The letters explained our plans and suggested that, if the firms had advertising material they would care to make available for use, as was customary at convention exhibits, we should appreciate receiving it. Such advertising material would, we thought, serve as a souvenir and make our exhibit seem more like a real convention exhibit.

Most hearty responses followed the letters. In some cases, further information was requested by the firm over the telephone. Others had their local representative make a personal call, to learn more about our plan. An abundance of valuable material was made available to be distributed by the demonstrator in connection with the demonstration. Pupils who had not attended the exhibit came the next day, to ask for copies of the literature that had come to their attention through pupils or teachers who had been present.

It was not planned to invite any firms to furnish any equipment or to send any representatives to put on demonstrations, as the committee members were to do all of the work and give the demonstrations themselves. It was to be *their* program. The willingness, however, of manufacturers and their agents to co-operate was in great evidence and was appreciated by the committee and the visitors.

One company representative brought out a late model of a check writer, a supply of sample checks on safety paper, and a quantity of ink eradicator. He showed the member of the committee who was to demonstrate his machine, along with the check writer of the school, the interesting features of his machine, and the supplies, and left everything in this student's care to demonstrate the next day. It proved to be one of the most interesting displays.

A typewriter company was so much interested in the idea that two of its representatives came with one of their earliest models, two later models, and one of their latest portable models. They willingly demonstrated their machines to a pleased group, who referred many times later to what they had seen.

A number of teachers from other departments of the school were in the group of visitors, to the embarrassment, at first, of some of the pupils who were giving the demonstrations. They had the feeling that they could not show the teachers anything that they did not already know; but they found that the teachers were as interested visitors as any present.

Word about the program reached some of the teachers in other high schools in the city. They asked and received permission from their principals to leave their buildings an hour or so before the close of their school so that they could be present at our exhibit. The program was given after school hours, on the time of the pupils from 3:05 to 4:30.

"Ballyhoo" might have attracted more pupils, who would have come through curiosity; but genuine interest could hardly have exceeded what was in evidence at this exhibit.

Yes, from what was learned in preparing the program, and the amount of interest shown by pupils and teachers, the program seems worth while.

The business typist says:

Unarranged Tabulations Are OUT

CLYDE I. BLANCHARD

MOST typing textbooks, after giving some preliminary explanation of how to arrange a tabulation, give unarranged tabulations for the student to set up in suitable form. In checking back over my own business typing experience, which included considerable tabulation work, I could not recall setting up any tabulations from unarranged material.

Most teacher-training institutions offer courses in the improvement of instructional materials, so it occurred to me that perhaps an improvement should be made in the tabulation materials given typing students. I wrote a number of typing teachers asking them if they would inquire of some business firms in the community. They responded wholeheartedly and here are the findings: *not one investigation uncovered the use of unarranged tabulations to any appreciable extent.*

- Harold J. Jones, Thomas Jefferson High School, Council Bluffs, Iowa

Perhaps the information from these eight offices will add a little to the material you are collecting on tabulations. The following six offices I interviewed personally in Fairfield, Iowa.

Fairfield Lumber Company. "I have been here eighteen months, but I never have to tabulate materials."—*Mrs. Harold Newlon, Stenographer*

Woolworth Store. "Our girls have nothing unarranged to tabulate. Of course, we do have some forms to be filled out."—*H. F. Ravely, Assistant Manager*

U. S. Employment Service. "No."—*Celeste R. Coop, Stenographer* (The manager showed me some forms, with carbons, which call for tabulation. However, it was just copy work.)

First National Bank. "I have some—such things as a list of bonds. Very seldom in letters."—*Mrs. Hoskins, Stenographer*

County Clerk's Office. "Very little, but we have to copy some which come to us already set up."—*W. S. Parkin, Chief of Court*

County Engineer's Office. "We do not have any unarranged material that has to be tabulated."—*Olive M. Leech*

I wrote several of my former students who are now employed, asking whether they had had to type any unarranged tabulations after

leaving school. The following are some of the replies I received.

"I don't type any tabulated or unarranged material to speak of, and few of the girls up here do. I guess that in a bank, at least this one, most of the work is already arranged in some sort of form and the girls follow that."

—*Donna Adamson, Stenographer*

"I have little or no unarranged tabulated material to set up. I work for Finlayson, McKie & Kuhns, Attorneys-at-Law, Omaha, Nebraska."—*Barbara Mogensen, Secretary*

"I'm afraid I won't be of much help to you in regard to your questions. We have little or no unarranged tabulated material. We very seldom have anything unarranged because there is a form for everything we do. The only thing would be the bills at the end of the month, and they are arranged a certain way with about three tabulations. In my opinion all that tabulated material we had in typing was really a waste of time and money because ever since I started working I have never seen any of those tables we worked on. About the only place you would find tabulation material would be in a census bureau or an organization that does much research work."—*A friend of Barbara Mogensen*

- Miss Marjorie Fitch, Doctoral Candidate New York University

In all my varied experience I have no recollection of being given material in paragraph

form to be arranged in tabulation form. Most executives are tabulation minded: in dictation they often indicate by some expression other than the actual word "tabulation" that the material which follows is to go in tabulation form in a letter. For myself, I usually take this material down in the notebook in a rough tabulation form, not strictly in paragraph form.

When the material is not dictated, it usually reaches the typist's desk in longhand in a rough tabulation that should be classified as "copying from rough draft" because it is likely to be interlined with additions and corrections. It frequently needs to be altered in actual arrangement, and it must always be counted for arrangement, as paging never comes out the same on written and typed copy. Sometimes the typist can improve the arrangement because of the greater condensation possible on the typewriter.

• Dr. Earl Clevenger, Oklahoma University, Norman, Oklahoma

I finally got around to visiting some offices and talking with office managers about their practices with regard to tabulation. Wednesday afternoon I spent in offices. Thursday evening, at the monthly meeting of the Oklahoma City Chapter of NOMA, I raised the question about the form in which copy that is to be tabulated is given to the typist.

Almost unanimously the answer was that copy is arranged in pencil in the tabular form in which it is typed before it is given to the typist. There was one case in which an office manager dic-

Long-distance telephone charges--
Night rates (after 7 p.m.) from
Yonkers, N.Y., to Alexandria Bay,
N.Y., 75¢; to Copperstown, N.Y.,
45¢; to Lake George, N.Y., 55¢; to
Lake Placid, N.Y., 65¢; to Niagara
Falls, N.Y., 85¢; and to Platts-
burg, N.Y., 75¢.

Business typists report that they rarely type tables from unarranged copy.

It was repeatedly stated that ruled forms (printed, mimeographed, or dittoed, or sometimes accountants' working paper) are ordinarily used; a pencil draft of the figures is placed on these so that all work may be checked for accuracy before submitting it to the typist.

For the reasons just given I was not able to obtain copies of unarranged materials, since copy is arranged for the typist as suggested above by every firm from which I obtained information. As previously suggested, I spent an afternoon visiting offices and used the question in a round-table discussion at a monthly meeting of NOMA.

One office manager went so far as to say that he believes it is the task of the office manager, not the teacher in school, to teach the typist to tabulate from unarranged copy—because practice on such work varies widely. He further said that, if the teacher can teach

tabulation from pencil copy as arranged on columnar ruled forms, he has done his part of teaching tabulation. He said that no typist just out of school will be able to pick up on office work and do this; and that very few senior typists can do this even after becoming familiar with the forms used in the particular office. Thus it is the task of the office manager to teach it to fit the needs of his own office.

When he finished his statement there was

Notice of Price Change
Effective January 1, 1947

Article	Old Price	New Price
Desk Set #91	\$ 18.75	\$ 19.50
Addressing Machine #149	250.00	242.50
Tabulating Machine #10	425.00	420.00
Postal Scale #466	17.25	18.00
7.500 Lamp #2267	46.20	48.15
Clocks #722	65.00	72.00
Chairs #906	46.00	43.00
Chairs #907	62.00	62.00
Chairs #908	72.00	75.00
Lockers #80	110.00	92.00
Steel Cabinet #89	72.00	74.00

Mary: Arrange these by Catalogue #. Must have this this afternoon

Use the same distribution of copies that we used on the July 1 memo.

Check this item with J.S. forms.

RG

At its worst, business tabulation for the typist is at least in rough draft form.

a rather general attitude of approval voiced from the members of the chapter present. Such offices as Oklahoma Gas and Electric, Oklahoma Natural Gas, Remington Rand, National Cash Register, Standard Cash Register, South-Western Bell Telephone, General Mills, and other nationally known organizations were represented in the discussion.

• Julius Nelson, Baltimore, Maryland

I have contacted four of the largest firms in Baltimore, one governmental agency (where, as an employee, I have firsthand information), and twenty smaller firms of different types. In other words, I attempted to get a cross section.

The summaries indicate, beyond question, that wholly unarranged matter is seldom (if ever) given to typists to arrange in tabular form; and when it is, it is usually of an extremely simple nature and is given only to the more experienced typists.

"Experienced girls can, with very brief instructions given during dictation, develop the proper setup either in tabular or paragraph form. New girls and girls of little experience require some detailed explanations. Where setup is somewhat involved, a rough sketch may be supplied. Usually, rough drafts and notes are made in their notebooks."—*Consolidated Gas & Electric Company, Baltimore (100 typists)*

"Any material given our typists is furnished in a partially arranged form. We seldom, if ever, furnish them with material wholly unarranged."—*Standard Oil Company of New Jersey, Baltimore (20 typists)*

"Usually material to be arranged in tabulation form is given to our typists in a penciled rough-draft form. We find it more satisfactory to do the preliminary arrangements before turning it over to the typists. However, we do depend on them to set the material up insofar as spacing and final arrangement are concerned."—*McCormick & Company, Inc., Importers and Exporters, Baltimore (50 typists)*

"Although both arranged and unarranged matter is given to be tabulated, only the more experienced are given the unarranged matter—and that is usually of a very simple nature. On most types of tabulated matter, a 'dummy' or rough draft is first set up."—*American Oil Company, Baltimore (100 typists)*

"During my four years with the Treasury Department in Baltimore, I have come across numerous types of tabulated matter, some involving twenty or more columns. Seldom, if ever, is any of this matter given to the typists in unarranged or paragraph form. Material is usually written out in pencil or ink by supervisors or department heads in some type of rough-draft form, and typists are expected to set up the proper spacing."—*Julius Nelson, United States Treasury Department, Baltimore (150 typists)*

"Examination of the tabular work by typists working for these firms indicates to me that material would not have been given to them wholly unarranged. Discussion of the matter with both employers and typists involved bears out this fact."—*Twenty smaller firms, employing from 1 to 3 typists each, Baltimore*

• Miss Edith Tuchman, Newark, New Jersey, City Schools

(Miss Tuchman sent a questionnaire on this subject to several graduates of her commercial department, all of whom are employed as typists or stenographers. Here are excerpts from their replies.)

"Every Monday morning I get new business sheets. I have to take the information from these sheets and set them up in tabulated form for one of the supervisors in order to determine the net gain of new business for one week. However, this takes place every week and has become routine work and, though it may seem queer to you, I have never classed it as tabulation until I received this letter from you. When I actually thought about it, I found out I was doing the work and enjoying it as much as I used to dislike doing it in school. That is the only type of unarranged tabulation that I have done since I have been working with this company, except to copy straight from a sheet that was already tabulated."—*Helen Casey*

"I am sorry to say that I only found one person in my office who does her tabulatory work the way we were taught to do it in school. She actually counts out the longest word, the spaces she will need, and so forth. I use tabulation very rarely; and, when I do, it is usually a very special job that has to be done at the request of an agent, or on a demand from our home office."—*Anita Horn*

"My duties include figuring of barometers and making up monthly reports to be sent to the home office showing the amount of business received for each class of insurance and the loss ratio for same. I also make up salary-increase reports showing the employee's name, position, present salary, and the amount recommended. Many times agents ask for a schedule of commissions, and I must show a column of the classes of business and then three other columns showing our local, regional, and general agency commissions. These are just a few of the times I have occasion to use tabulation, but I would most certainly recommend that students taking the business course be taught tabulating."—*Rita Stager*

"In answer to your request for some information, you will find enclosed a few samples of the work I do. You'll notice I type a great many numbers, and I'd suggest you drill your pupils on them more than has been done. When I left school, I still had to look at the keys to strike numbers; and that is why at first it was so difficult for me to do my work." [Note: The samples enclosed were forms that required fill-ins in ruled columns mainly.]—*Dolores A. Russo*

"Tabulation is a vitally important part of my job. There isn't a day that passes that I don't have to rearrange information into tabulated form. It is rather difficult for me

to send you such unarranged material because in the main such information is found by me in our various files—not in one form or letter, but in various papers and forms throughout the file.

"For instance, at different intervals I am called on to prepare a closing statement. This statement is not dictated to me by my employer; instead, he gives me the file and requests that I prepare such a statement for him. It is then my duty to get out all the data necessary, such as the aggregate amount of water bills, tax bills, insurance premiums, mortgages, rents, and so forth, apportioned as to the date of closing, and arrange the figures into a neat tabulated form.

"Another form of tabulation included in my daily work is the arranging of block, street, lot, and map numbers. Such numbers are found by me by looking through an abstract of titles prepared by my employer. I then arrange them in tabulated form, putting each number in its respective column.

"On several occasions I am called on to type, in tabulated form, house investments. The columns run something like this: Location, Rooms, Bath, Heat, Garage, Tax, Price, and so forth. This is all unarranged material found by me by looking through various real estate lists, and other sources."—*Gloria Wickham*

RESEARCH RELATIVES • Do you ever use "negative-practice" procedures to eliminate type-writing errors? Some authorities believe that, under carefully controlled circumstances, such practice may be helpful.

At one time it was thought that errors would disappear in time through a passive process of neutral decay that we call "forgetting" or "disuse." O. H. Mowrer, however, comments that ". . . it seems that learned responses are never eliminated in the sense that their neural correlates are erased, but only in the sense of being superseded by other antagonistic responses."¹ One of these antagonistic responses is "negative practice," a process whereby the typist corrects his errors by deliberately practicing the word incorrectly. That is, if he has a tendency to write *hte* for *the*, he practices the word as *hte*, concentrating on the fact that it is being typed incorrectly. August Dvorak and others have advocated this procedure.

This method of correcting errors has been used successfully, but Peak says that the effects are inconsistent, pointing out that, in some situations, repetition eliminates the repeated response, but in others it *establishes* the practice response (fixes the error).²

Obviously, then, any use of this negative practice in the typing classroom must be handled under carefully controlled conditions.—*Kenneth J. Hansen.*

¹O. H. Mowrer, "Motivation and Learning in Relation to the National Emergency," *Psychological Bulletin*, XXXVIII: 421-422, June, 1941.

²H. Peak, "Negative Practice and Theories of Learning," *Psychological Review*, XLVIII: 316-317, July, 1941.

The "Why" Approach in Bookkeeping

E. C. MCGILL
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Do your students say, "But that is the way it is done in the book"?

IT IS so easy for teachers to fall into the the effortless routine of having students perform a bookkeeping operation in a manner similar to that in a text that teachers must constantly and critically re-examine the approach to every new unit of work performed in the instruction of bookkeeping. The student must know *why*.

We must place ourselves in the mental position of the untrained and inexperienced student. Does he really understand, for instance, why certain accounts are reversed on the first day of a new fiscal period; or does he make such entries simply because they were reversed in the illustration in the text or in the sample problem worked by the teacher?

It must be granted that bookkeeping cannot be successfully taught by use of the theoretical approach alone; but on the other hand, theory cannot be completely omitted in the instructional plan. The student may be expected to ask why certain transactions are handled in a prescribed manner; but, if he fails to inquire, the teacher must stimulate thinking so that the reason or reasons underlying a particular procedure are brought foremost in the learner's mind.

The student has learned very little unless he understands the reasons underlying each bookkeeping transaction. Once he develops the ability to apply basic principles to similar situations without having to copy a pattern, he has *learned*. Reasoning ability should be deeply imbedded in the instructional program.

The following is an illustration of the "reasoning" or "why" approach to the teaching of bookkeeping. A problem:

The Whiteway Grocery enters all of the charges for paper bags, wrapping paper, twine, display materials, floor sweep, and so forth into an expense account, Store Supplies. At the close of the fiscal year this expense account had a debit balance of \$475.50. Upon completion of the inventories at the end of the year, it was found that \$137 worth of items that had been charged to Store Supplies were still on hand and would be used next year. What is the adjusting entry?

It would be easy to tell the pupils, "Debit Store Supplies Inventory and credit Store Supplies." It would be easy to tell the pupils, "See how it was done on page 167 of the text." But an explanation of *why* the entry is made thus-and-so is owed the students. They must understand that the account, Store Supplies, is an expense account; and that, since all expenses result in a decrease of the net profit of a business, this account would also be charged against the profit unless there is an adjustment for the unused portion of the supplies. If the total debit of \$475.50 were closed out as an expense against operations for the fiscal year, there would be an understatement of this year's profits to the extent of the \$137 worth of supplies that were not used. Moreover, the next year's profit would not be stated properly because this \$137 worth of store supplies would be used but not be charged as an expense against operations for that period. We must make it clear that an expense is not necessarily realized at the time of the purchase of supplies, but only at the time that they are used in the operation of the business; furthermore, that only those supplies consumed during a fiscal year are expenses for that period.

By applying this same explanatory approach to other adjustment items, we can make our bookkeeping pupils understand the fundamentals of adjusting entries. They will remember how to perform any bookkeeping transaction if they understand the reasons for it. But, if pupils handle a transaction in a certain way just because a single example was handled in a like manner, they will soon forget the details of entering the transaction.

After adjustments, the ledger accounts would appear as follows:

(Expense)	(Deferred Charge)
Store Supplies	Store Supplies Inventory

Store Supplies Inventory is a real account that shows the value of the deferred charge to expense store supplies.

Store Supplies is an expense account whose balance will have to be closed out.

Another question that should demand the attention of the pupil is, "Why must accounts be closed?" Too many pupils learn to close certain ledger accounts simply because the textbook examples were closed. There are many who cannot distinguish between those accounts to be closed and those to be left open at the end of the fiscal period. Once again: if the question is approached with reasoning, each pupil will be able to determine for himself which accounts must be closed at the end of each fiscal period.

First the pupil must learn to distinguish common ledger accounts. We lean upon his past learning: "The difference in expenses and income is profit. All expense accounts must be combined and weighed against the combined income accounts to determine the real profit or loss. A convenient place must be found for summarizing the expenses and income. Hence, we use the 'Profit and Loss Summary' where all of the expenses are entered on the debit side and income on the credit side."

Pupils then must be made to understand the reason for making the closing journal entry.

Because the ledger account, Store Supplies, has a debit of \$475.50 and a credit of \$137, the difference is a debit of \$338.50, the actual expense incurred during the fiscal year. This balance must be taken out of the account to avoid charging this expense on the next year's operations. How can it be taken out? Pupils know that erasing is never permitted in accounting records and that striking out an entry is allowed only in correcting an error; so he cannot erase or strike out to make the adjustment. The only remaining method of taking the expense out of the account is the balancing method, in which the total of entries on the debit side equals those on the credit side. The pupils must understand that an amount cannot be entered in the Profit and Loss Summary unless it is first taken out of some other account. This explanation should set up the basis for the closing operation:

First, close all expense and income accounts so as to prevent including their balance in the next year's computation.

Second, an account can be closed only by making the debit and credit sides balance. Hence, all expense accounts must be credited for closing because expenses always have a debit balance.

Third, from deduction we must assume that all accounts involving an expense or income must be closed (for the reasons previously stated).

Fourth, an amount cannot be entered into the Profit and Loss Summary unless it is first taken out of something else—namely, an expense or income account.

Fifth, to compute the real gain or loss over a period of operations, all income and expense items must be included in the computation.

After closing entries the ledger accounts would appear as follows:

Store Supplies		Store Supplies Inventory	P&L Summary
475.50	137.00	137.00	338.50
	338.50		

Note: The Store Supplies Inventory account carries a balance of \$137, the value of the supplies on hand. This will have to appear in the listing of the things of value that the firm owns (assets—deferred charges to expense).

The Store Supplies account has now served its function for this period of operations since it now balances. In order to avoid using those old figures next year, the account must now be ruled so that next year's store supplies expenses can be entered without confusing them with the past expenses.

WE TEACHERS must remember that we are attempting to teach a process that is basic to all accounting operations—not just a chapter, a problem, or a text. If our duty is well accomplished, the students in our classes will develop a reasoning approach to all bookkeeping situations. The student must think in terms of general principles that he can apply to any bookkeeping situation similar or dissimilar to the textbook pattern. Our teaching is not complete until the student is able not only to perform an operation well, but also can tell *why* each step is performed and can apply the basic principles of the operation to other situations arising in practice.



New around here, aren't you?

Christmas Time in the Classroom

EVERY teacher knows the difficulty of holding students to fixed assignments on the last days before the Christmas holidays. Perhaps the best way to combat the situation is to forego the idea of picking up all the loose ends before vacation and to plan a surprise day or a special project for the students. The activities described below have been used successfully and stimulated great interest.

A shorthand brief-form drill may be given quite painlessly in the form of a spirited contest.

Sides are chosen in the same way that is commonly used for a spelling match. Any brief-form chart, such as those in textbooks and on the back of shorthand notebooks, may be used. Naturally, it is important that everyone in the class have a copy of the same chart. The students are asked to number the columns both across and down. Choosing sides, numbering charts, and a general explanation of the plan may be completed the day before the contest. Understanding the plan to be used will encourage students to review the brief forms.

When it is time for the contest, the two teams stand facing each other, and each student holds a brief-form chart. Turns are taken as in a spelling contest. The teacher calls the number of a column, such as "5 down" or "9 across," and the student reads the brief forms contained in that column.

If the student is unable to complete the reading of his column in a quarter of a minute, time is called and he must be seated. If he completes the column, the instructor says nothing but calls the number of a column for the first student on the other side to read.

Errors must be caught by someone on the opposing team to put a person out. Everyone remains quiet until the student has finished reading. Then, if an

opponent's hand is raised, the instructor asks him to tell the reader the error or errors made; and, of course, the one who made the error must be seated. If the opponents do not catch the mistake, the instructor goes right on to the next person; but, after this student has read, the error of the preceding student is called to the attention of the class. In order to keep the seated students alert and interested, they may still call out errors on opponents.

The contest may be ended after a previously arranged period of time or continued until only one person remains standing. For a pre-Christmas contest, the winner receives a prize; something like candy, which can be shared with the entire class, leaves everyone in a happy mood.—*Rida Duckwall, Topeka (Kansas) High School.*

EVERY year when the Christmas season brings greeting cards into store windows, the Duplicating Department of Hadley Technical



A stencil-duplicated greeting card.

High School embarks on a program of stencil-duplicating greeting cards. Usually we standardize on a double-folded, or "French Fold," card because, in this format, each project requires only one stencil and the duplicating can be done on ordinary duplicating paper stock.

Last year we used the design shown in the accompanying illustration. The three parts represent three of the pages, and the blank part becomes the back of the folded card.

Not satisfied with ordinary paper for the special occasion, we experimented with various stocks and found that a 20-pound bond paper gave good results. Neither were we satisfied with ordinary black and white and originally planned to use three different colors. You will observe that the three portions of the illustration are far enough apart so that each could have been printed in a different color at one running. But, instead of following this procedure, we search for some other method to give glitter to our cards.

Virkotype Process. A friendly printer offered us the use of his Virkotype machine, a device used in embossing. We ran our stencil-duplicated copies, sprinkled them with several colors of Virkotype compound, and then put them in the heating machine. A desirable raised-letter effect was obtained. Later, we tried using a heated electric iron as a substitute for the machine and found it fairly satisfactory.

Water-Color Process. Unique and gratifying results were obtained by running enough cards to produce the outline of the design. Assorted water-color pencils were used to "chalk in" colors as desired. Moisture was then added to the pencil colorings, and the paintbrush effect of the coloring inside the black outlines was, according to general agreement, "just what we have been looking for."
—E. W. Alexander, principal, Central High School, St. Louis, Missouri.

TYPEWRITER bridge is well known to most typing teachers and may easily be dressed up for a Christmas party.

Sheets from small, colored scratch-pads are used for tallies. A Christmas seal of Santa Claus or of some toy is placed on the corner

of each tally. Using only two colors for the tallies and distributing them so that partners receive the same color facilitates the giving of instructions.

The first two students in Row A and the first two students in Row B form Table 1. The four students back of them form Table 2, and so forth. Those sitting diagonally across the aisle from each other, Student 1 in Row A and Student 2 in Row B, are partners and have tallies of the same color when the game begins. If one student is left over in grouping by fours, he may time the tests; if two are left, they may work as partners one time and then fill in at the last table on the next round.

Progression follows the common bridge form, with the highs remaining at the head table and lows from there going to the foot table. At all other tables, the lows remain and the highs move up one table. Each time a move is called, everyone changes partners.

Scores are based on one-minute timings. After a timing, students remove papers from the machines and give them to opponents for scoring according to standard typing rules. Partners add their net rates together for a score to be placed on their tallies. Of course, no rate is below zero, regardless of errors.

When it is time to end the game, each person finds the total of the scores on his tally. A prize, usually of the dime-store variety but wrapped in Christmas wrapping, is given to the winner. Fun may be added by awarding a typewriter eraser to the one with low score. This is also gift wrapped and usually given to the student with the comment that it is "something he is likely to need."

Perhaps the educational value of such a class period is not great, but it is rather surprising how much even seniors in high school enjoy it. It sends them off on vacation with the feeling that school can be fun; and that, after all, the teacher isn't half bad although he does usually make them work pretty hard. It is barely possible, too, that "that hard-boiled teacher" may have just a wee bit of trouble to hold himself in line on that last day before vacation. After all, he is only a human being and probably also has interesting Christmas vacation plans.—Rida Duckwall, Topeka (Kansas) High School.

What a Sales Class!

LOUISE HILL BOGGESS

The further adventures of that extraordinary business teacher, Miss Jane Wilson

JANE WILSON walked determinedly into the principal's office. This was definitely the last straw! "Mr. Neal—"

"Now, Miss Wilson, I know exactly what you're going to say—it's that class in salesmanship."

"Yes, if you're referring to those fugitives from education—all thirty-two of them—as a class in salesmanship!"

"Miss Wilson, do you realize what a splendid compliment I paid you?"

"Don't work your sales psychology on me. Do you realize that out of a class of thirty-two, thirty have tried and failed practically every course in the school? Do you give them trigonometry, commercial law, or arithmetic? No, you give them salesmanship and tell them it's just common sense—anyone can pass it!"

"Exactly. Most of them are working on jobs. They can use the psychology. Don't you realize that we have failed to reach them, and that this is our last chance? I've given them to you because I know you won't let me down."

"Those words don't touch me. I don't want the class!"

"Some of the students didn't want it either. I had to talk to Wayne for two periods, to get him to drop physics and take salesmanship."

"You knew he couldn't pass physics."

"And it wouldn't do him too much good; but he is working in a grocery store and it would help him to learn some sales psychology. Those students need instruction."

"I know: 'It will carry them far down life's pathway.' You haven't talked me into it; you haven't given me any other choice. What am I supposed to do with those thirty Charlie McCarthys—speak and think for them?"

"That's it exactly! Speak and think for them until they get the knack of doing it for themselves. That's diagnosing the difficulty. All you have to do now is use

the right antidote. I'll be willing to wager that at the end of the semester you're going to say that it's the best class you ever had. It challenges your initiative, your teaching principles. . . ."

"Verily, I shall accept this challenge; but please don't do this to me again next semester."

"That's the spirit, Miss Wilson! Believe in them and in yourself—that's the first principle of salesmanship. Luck to you!"

"I'll need it." And that was that.

IN THE middle of the first period in the sales class her sense of humor was tested severely. Jane was telling the class about unique devices of collection.

"Many companies in large cities have installed the automatic collector, a device attached to refrigerators and washing machines. A few coins are deposited each week; and, at the end of regular intervals, a month or two, a man from the company comes around and empties the meter. If the money is not deposited in the box each week, the current cuts off, and the machine won't work."

Billy raised his hand and assuming a half-standing, half-sitting position at his desk demanded: "That may work all right; but how is a washing machine to know when a week is up?"

The class was in an uproar that refused to settle itself completely for the rest of the period. If the principal had been there, Jane would have said, "See what I mean?"

For that was her first problem—discipline. Bobby was small and cute, but a little too old to be constantly moving about teasing the girls in a grade-school fashion. Freddie had the window-gazing habit and only rallied when spoken to for a third time. Ruby had a bobby-sox crush on Don, who retaliated too ardently. Ernestine had too much to discuss with Betty Jean.

What a Teacher!

Red was too busy flirting with Florabelle, a new student. It was a case of every one for himself; and who wants to study salesmanship anyway? Not even the teacher. She tried the old formal discipline methods, but they failed utterly. Interest—that's what they needed, and Jane resolved they'd get it if she had to turn handsprings.

By this time she had waded through three chapters to the subject of personality. She dropped by the library that morning: "Natalie, do you have Bennett Cerf's *Try and Stop Me*?"

"I'll get it for you if it's in. Do you want any other? Sign here."

"Thanks a lot. I'll send it back promptly."

Perhaps if she could get them interested in reading current books, they would forget about misbehaving. So Jane read to them from *Try and Stop Me*, selecting sketches on outstanding personalities. They liked it, and the next day nonreceptive Bobby met her at the door: "Miss Wilson, my brother has a book something like the one you read us yesterday. It's not so much about famous people, but it's about a reporter who interviews different personalities."

He handed her H. Allen Smith's *Low Man on a Totem Pole*.

She promptly selected amusing passages to read them. Florabelle found in *American Magazine* an article on the insolence of salespeople, which Jane insisted Florabelle read to the class. Ruby, while working in the library, found Joan Bennett's *How to be Attractive*. Wayne brought an article he had found in *Holland's Magazine* called "Nearest to Heaven" in which he read and pointed out the salesmanship the author was using in publicizing Texas. Don found a similar article in another issue, "So You Don't Like Texas." By the time the class reached the chapter on advertising, Ellen had Phillips' *Skin Deep*; and job psychology brought forth MacGibbon's *Manners in Business* and Catherine Bleeker's *Business Etiquette*.

From reading alertness, the class moved on to seeing and hearing sharpness. Wiggling Bobby opened class with this remark, "Miss Wilson, did you see the show, *Mildred Pierce*? It ties right in to today's lesson about location of business. In fact, the whole show was on salesmanship."

"And Miss Wilson," Emily put in, "the

Red Skelton broadcast last night was pretty good, too—the way the bad little boy worked his grandmother by telling her how kind and generous she was when she was going to whip him." Jane tied these things right into the chapter on barriers to a sale, and the class all contributed with personal working experiences or tidbits they had seen in shows or heard over the radio.

Freddie, who had never quite caught the growing spirit of curiosity, startled Jane one Monday morning by saying, "Miss Wilson, I was off duty last Saturday night; so I took a look at the salesgirls in this class to see how good they were on their jobs. An elderly lady came in where Ellen works, complaining because the gadget she had bought wouldn't work. Ellen showed her that it would and made the lady work it herself. Before she left, Ellen had sold her more stuff to go with it."

"I wouldn't have known how to do that if we hadn't talked about it here, but it sure works," Ellen remarked.

"Of course, it works! You can do anything you set your mind to do," Jane reassured.

Judy asked, "Do you really think so? I read in *Life Magazine* that you could become a junior executive with some large department store if you took the right college course. Do you know anything about it, Miss Wilson?"

"No, I don't, but I do know a girl who has accepted a similar position recently with Joske's in San Antonio. I'll be glad to write her for any information. Also, Mrs. Crissy in distributive education should have some material."

"Miss Wilson, while we're talking about jobs. Well, could you—you see I'd like to write short stories, and I have one here."

"Why don't you read it to the class, Don, and get their reaction on it?"

"It's about salesmanship. It's an incident that happened in the store the other day, and I thought I might sell it."

"Class, Don is going to read us a short story. Let's help him out and give him all the ideas we have on how to sell himself. That's what he has to do in his story."

Jane gauged the eagerness with which they responded to the story and was amazed at the practical suggestions they volunteered. The class agreed it was a good idea, a timely

problem, and had plenty of human interest. Although Don may never sell the story, he was given inspiration and encouragement by his co-workers.

It was the next day that Joan brought some of her handwork to show what she did as a hobby. Financially minded Jimmy immediately proposed, "She ought to be able to sell that stuff if she can do it fast enough. Women go daffy over it. I've noticed that in the store. She might try to market it. They probably won't pay too much, but it will give her a start."

"That's a good suggestion, Jimmy. What about it, Joan?"

"I'd love to do it. I have quite a bit around the house—pillowcases, dresser scarfs—and it doesn't take too long to make them."

"Why don't you try Babyland? They have a lot of stuff like that in the window," Dorothy suggested.

Jane was pleased to see the class trying to launch another member on a career. The whole class was becoming sales conscious; and she herself was continually thinking, "Now, this would be a good idea for Florabelle, or how would Ernestine work out in this?" Personal interest began to show in their grades. Jane found that, whereas 50 per cent had failed the first two quizzes, 50 per cent were now making *A* on the recent ones.

She questioned Kenneth, "How did you make such a good grade? Only a few weeks ago you were failing the course."

"Aw, it's just common-sense stuff. Any guy can pass it if he thinks about what he's doing on the job. And say, the manager called me in and asked me to demonstrate the new merry-go-round that costs \$69.75 in the toy department. I knew the cost would scare people, but I stuck to its good points—like 'durability.' I really did practice my speech and was ready for any question. The manager is going to let me demonstrate more and more stuff. This course is solid."

MR. NEAL stopped Jane in the hall and asked, "What are you doing in salesmanship, Miss Wilson, that make so many requests for the class?"

"Why nothing unusual, but I do like the class. It's the best I have."

My Most Successful Ideas on

I DOUBT that there is any subject in the high school curriculum as extensive, as broad, as full of possibilities, as is junior business training—to a teacher interested in it.

I doubt equally that there is any subject that entails such drudgery, such hardship, such pains, such despair, as does junior business training—to a teacher who lacks the foundation or interest, or to a teacher who cannot view the course beyond the covers of the textbook.

Yet I have always liked the subject, have enjoyed working with my groups, and have taken pride in the popularity of the course in my school. Teaching is fun; teaching the elements of business is more than fun—it can become a hobby.

"How do you have such enthusiasm?" you may ask.

Junior business training, I have found over a period of years, is peculiarly adapted to projects—projects of every sort, projects adaptable to student interests, projects that scoop the student into eager participation in the subject. In projects I have found the stimulation to my teaching. A commercial teacher can easily find a wealth of material to enable himself and his group to engage in projects that parallel and supplement the textbook.

The nature of your projects will reflect the natures of your students—their likes and dislikes, their vocational interests, their skills. Sometimes the projects afford real opportunity for the teacher to make vocational analyses. Edward, for example, liked to draw. He began the junior business course with little enthusiasm. When assigned to a poster project, however, he took pride in his ability and developed both interest in the subject and interest in drawing. Victor was another artist, with an artist's temperament; but personal contact developed application of his ability, so that he contributed two excellent paintings.

Posters

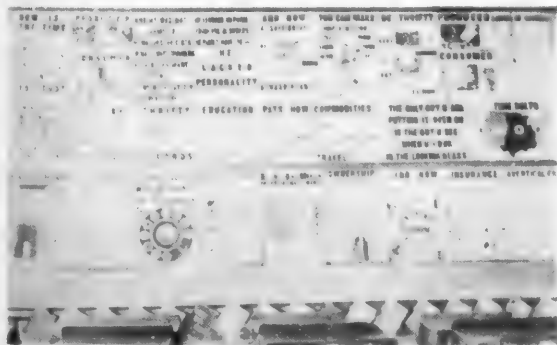
Poster making, a project of particular interest to young high school students, contributes a great deal to learning. Every

Modern Junior Business Training

STEPHEN D. LIPTAK
Whittier School
Bridgeport, Connecticut

youngster takes pride in making a poster, and will remember forever the particular phases of business that he interpreted graphically for his classmates. Real research into backgrounds and information results in new interest in the textbook as a source of information; results in new interest in the business activities of the community as a source for exploration; and results in new interest in getting the facts for display. As a final result, a poster is made—but only as a by-product; the real result is vitalized guidance information, business information, and other functional understandings.

For example, when we recently tackled the unit on transportation, one class developed enough posters to fill a side of the classroom (see illustration). I capitalized on student interest in the history of Gustave Whitehead (an inventor who flew a plane in Bridgeport, and, uniquely enough, near our school, two years before the Wright Brothers made their more famous flights) to expand this student interest into the fine points of present-day transportation problems. Prices, schedules, advantages and disadvantages, services, purposes—all of these facts, basic to understanding, were dug up and pictorialized for each of several phases of transportation—boat, bus, train, air, motor, and so on. The students, by virtue of the supplementary work and deep drawing on the textbook, were able to find full growth, individual achievement, and individual under-



Mr. Liptak's classroom displays student project work.

standing at levels untouched by the student who simply reads and recites on so many pages of textbook.

Assembly Program

When our classes were first asked to prepare a junior business assembly program, the students evolved an idea that again entailed a full-scale project. First they selected a topic worth presenting—the history of communications. Next they engaged in a feverish research to determine *for themselves* the history of communications. Then they prepared large posters, each devoted to picturizing a phase of the development of communications in this country. The whole class worked over the posters until each was as dramatic a poster as our means made possible (and incidentally, the whole class learned communications as though each member had himself prepared the whole series of posters).

For the assembly presentation, the posters were used to decorate the stage. During the program, each poster was explained by a student of the class (public-speaking opportunity, that!), while class members in the orchestra provided suitable sound effects—cracking sounds for fire signals, booms for drum signals. (Others in the series included flag signals, the courier on horseback, the pony express, the stagecoach, the railroad, the steamboat, the telegraph, the telephone, the radio, the airplane.) Whenever extra dramatization could be given to any phase, this was done—like the semaphor signaling demonstrated by sea scouts in uniform to dramatize flag signals. Every opportunity was used to bring out local community interests—like calling attention to Whitehead's flight under the topic of the airplane, and mentioning how Bridgeport's first financial difficulty was caused by a railroad under the subject of railroads.

The success of this auditorium program has made it a regular attraction every year.

Self-Rating

I have discovered that the presence of a rating chart gives a junior high school pupil no great thrill of interest or responsibility.

When, however, a rating chart is presented at the end of a poster project on "Qualities of Success" or "Qualities of a Good Salesman," the young audience begins to take serious notice. Let a pupil explain—after proper preparation, of course—the meaning and importance of each characteristic, and the youngsters are eager to try to rate themselves. I've used a chart from a textbook¹ for a number of years. Year after

year, the median on this project has been a score of 73—supporting my contention that junior high school boys and girls are particularly honest when it comes to self-appraisal, when it is seriously presented.

The field of study in junior business training touches every aspect of students' interests. Study any one child; his interests will suggest a dozen projects in which he would be an excited participant. Study half the members of a class; and you'll have enough projects to excite you, too, year after year.

At least, I have always found it so!

¹Lloyd L. Jones, *Our Business Life*, The Gregg Publishing Co., New York, 1944.



Accounting Cycle Chart No. 4*

Adjustments for Deferred Charges

THE account, Deferred Charges to Expense, represents the amount of expense paid for but not entirely consumed. Insurance premiums are paid for in advance. However, if an accounting is determined on an accrual basis, accounts must be adjusted to bring present values up to date.

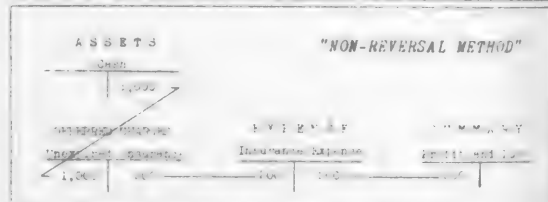
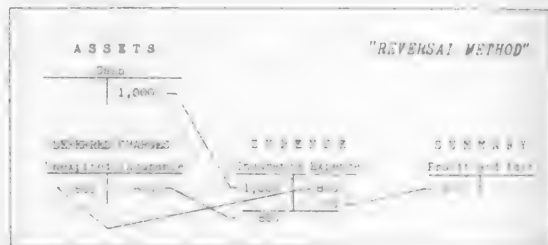
If the **REVERSAL METHOD** is used, the premium is charged to an expense account. At the close of an accounting period, the amount not entirely consumed may appear on the books as a deferred charge by a debit to the Deferred Charge Account under Assets, and a credit to the Expense Account. The balance of the Expense Account is then closed by a debit to Profit and Loss Summary and by a credit entry to the Expense Account. At the beginning of the subsequent fiscal period, a reversing entry is recorded, debiting the Expense Account with the unused amount, and crediting the Deferred Charge Account.

Under the **NON-REVERSAL METHOD**, the Deferred Charge Account is charged with the amount of the premium. At the end of the accounting period, the Expense Account is debited with the amount consumed and the Deferred Charge Account is credited. The Expense Account balance is then transferred to Profit and Loss. The balance of the De-

HOWARD A. ZACUR
Cedar Crest College
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ferred Charge Account represents the unused amount remaining on the books as an asset.

Under the **DIRECT METHOD**, the Deferred Charge Account is charged with the premium. At the end of the accounting period, the Profit and Loss Account is debited with the amount consumed, and the Deferred Charge Account is credited. The balance of the Deferred Charge Account remains on the books as an asset.



*Mr. Zacur's preceding three charts will be found in the March, September, and October issues, 1946, of this magazine.

Typing Beginners Can Keep

ONCE upon a time, a teacher applied for admission to an insane asylum. As soon as it became known that he was a teacher—and, worse than that, a teacher of beginning typists—he was admitted immediately. Thenceforth he enjoyed himself immensely, running hither and yon from morning till night, yelling to his heart's content, "Keep your eyes on the copy! Keep your eyes on the copy!"

Anger, shame, pleading, or the repetition of a phonograph record saying, "Keep your eyes on the copy," will never keep any beginning typist from looking at the machine—not while his curiosity is aroused and he wants to see what is happening on a new and complicated machine to which he is still a stranger. Just *what* will help him get that divine power of eyes-on-the-copy concentration?

It has been reported that all kinds of devices—blindfolds, darkened rooms, shields over the keyboard and the typed work, and typing without a ribbon—have been used to keep the beginning typist visually "in the dark."

Some teachers think that it doesn't make much difference whether the student looks at his hands, at the keyboard, or at the work in the machine; but they *do* want him to concentrate—and that brings you right back to "Keep your eyes on the copy." Ask a student about concentration. He will answer that when he looks at his machine or work he breaks his concentration, he makes mistakes, he loses his place. It is *desirable* for him to keep his eyes on the copy, and he knows it.

Perhaps his own will power will make him develop this ability of doing two things simultaneously—concentrating on copy and operating a machine. This may be where the old I.Q. comes in, if it comes in at all in typewriting. (Many persons to whom the pleasure of operating a typewriter is denied have heard that the I.Q. plays a very small part in said operation; and they have, therefore, concluded that it takes no brains to operate a typewriter, much less to teach it.)

But, even with a high I.Q. and plenty of

Eyes on the Copy

● HAROLD J. JONES
Thomas Jefferson High School
Council Bluffs, Iowa

will power, the poor beginner has to keep reminding himself not to divide his attention between his machine and his copy. And there are so many things to remember! But let's try another device: the use of carbon paper.

As soon as the beginner has learned that the typewriter operates a little differently than a slot machine, he is given a sheet of carbon paper. He is taught that when he hits a key it will print on the paper. If a carbon paper and another sheet of paper are inserted behind the original sheet, the characters will print on the second white sheet. He is also shown that if he sets his ribbon control for stencil cutting each key he strikes will show on the second sheet but not on the top sheet.

What has been achieved by all this? The temptation to look at the typewriter to see what is going on has been removed. Furthermore, the beginner knows that he will have a paper to check when he is done—the carbon copy. Knowing this, the beginner finds it easier and more imperative than ever to concentrate.

How long should students type on stencil with carbon paper? Until they have thoroughly established the habit of keeping their eyes on the copy. Even late in the semester, students should voluntarily go back to some practice work with stencil and carbon if they find that they are again dividing their attention between the machine and the copy.

Typing with carbon permits the eyes to be focused on one thing: the copy from which the typing is being done. From time to time, the beginner should be permitted to compare his carbon copy with the original from which he is copying. There always seems to be an element of surprise and interest in seeing just what his typed copy looks like. And, if you want to go back to the "perfect copy" idea (which, of course, you don't), you will be surprised to see that the typed matter is much better than the student would be likely to produce in any other way.

ARE we psychologically sound in using the stencil-and-carbon device?

Just look at what some of the psychologists have said:

Gates: "Periods of emotional upset, anger, chagrin, despair, disgust, great elation, and the like are very common at first, but are brought under control. In learning to typewrite, one must learn to adjust his emotional, as well as his motor, mechanisms to the situation."

James: "Never suffer an exception to occur until the new habit is securely rooted in your life. Each lapse is like the letting fall of a ball of string which one is carefully winding up; a single slip undoes more than a great many turns will wind again."

Kitson: (If you want to concentrate) "the first thing to do is to eliminate every distraction possible."

Betts: "One of the chief things in training the attention is to form the habit of attending."

I gather from these sources that, if concentration in typewriting is desirable and can be attained at least in part by keeping the eyes on the copy, we should attempt to eliminate unneeded mental and physical operations; we should try to see that no exception occurs; we should eliminate distractions and emotional upsets; and we should form the habit of attending. The use of carbon paper with the machine set on stencil will do wonders in working toward these goals.

There is also something in the laws of learning to the effect that one learns better when there is the incentive of some measure of success. When working with the carbon, beginners feel that they are learning something, and they feel considerable pleasure of achievement and accomplishment when they check their carbon copy and generally find it better than they had anticipated.

There are other incidental advantages. This kind of practice tends to remove the difficulty that so many beginners encounter in thinking that the machine is not working properly (be-

cause they can't work it); or that the ribbon isn't printing as dark as it should (or, as they put it, "The typewriter is out of ink"). The beginners will not be aware of these difficulties because their attention is on the copy rather than on the mechanical parts of the machine; and the carbon will always give them a good black copy if their touch is even.

Typing with carbon seems to eliminate fatigue to some extent because students do not change their posture so often. There certainly is less eye strain than when the student constantly looks back and forth from machine to copy.

After a few attempts, students often find that carbon typing is just what they need to keep them from wasting time and making errors by giving too much attention to their machine instead of to their copy and the mental and physical phases of typing.

I don't know what the psychologists will say, but to me the use of carbon with beginners teaches some habits—*especially the habit of keeping eyes on the copy*—in the easiest and most enjoyable manner I have found.

Comments by Harold H. Smith

The thing that strikes me about Mr. Jones' interesting article is not the originality of the carbon device—that is not new. Rather, it is his careful analysis of a problem and his attempt to test it by every conceivable type of experience and by the writings of recognized psychologists. Here at its best is an intelligent attitude toward the improvement of instruction.

Even more than the article indicates, the principal contribution of such devices is that they eliminate one or more distractions and thereby enable the typist to concentrate not only on the copy (a simple skill at best) but on the all-important conscious controls of mental and physical processes that together are typing skill and power.

Mr. Jones' interpretation of concentration may be oversimplified, but his device is a seven-league step in the right direction.

¹ Arthur I. Gates, *Psychology for Students of Education*, Macmillan Company, New York, page 248.

² William James, *Psychology*, Briefer Course, Henry Holt and Company, New York, page 145.

³ Harry D. Kitson, *How to Use Your Mind*, J. B. Lippincott Company, New York, page 114.

⁴ George H. Betts, *The Mind and Its Education*, D. Appleton-Century Company, New York, page 28.

MERRY CHRISTMAS

The B.E.W. is happy to present you with its service booklet No. 25. If you wish, you may remove it from the magazine and file it by itself—just open the staples and it will come out.—*The Editors.*

• Not for Skill Alone •

REALIZING the importance of following up the student on the job, co-ordinators from the San Diego Vocational School have been working in the San Diego field to determine the job-adjustment success of the student, to evaluate the instruction of the school, and to promote a friendly understanding between the employer and the school that they may work together to a better advantage.

For obtaining the desired information concerning the degree of success of the student on the job as to skills, work habits, attitudes, and human relationships, the informal personal interview with the employer was found a satisfactory method. The employer could thus qualify his statements, questions could be explained, and the one interviewed could be assured that his comments would be held in confidence. At the same time, the co-ordinator could give the employer information about the school.

The tabulated information obtained from seventy of these interviews concerning stenographic students showed 50 per cent of the employees superior, 30 per cent average, and 20 per cent below average.

Those classified as superior were, for the most part, above average not only in skills but also in attitudes, human relations, and personality. This showed that the successful worker was the worker with both an adjusted personality and adequate skills.

In the group classified as average workers, although work habits needed improvement, the attitudes of the employees and their relation with the employer, with the public, and with fellow workers were rated as above average. The result was success rather than failure on the job.

Insufficient production and unwillingness to accept criticism took first place as a cause of inefficiency. Lack of skill and harmonious relations with the employer came second.

Other causes of inefficiency were inability to follow directions, unsatisfactory relations with fel-

Seventy San Diego
Employers Evaluate
Stenographic Success

EMILY ZIEGLER
Vocational High School
San Diego, California

low workers, lack of interest in work, inability to adjust to new situations and to meet the public satisfactorily, and lack of co-operation with the regulations of the firm. Strange as it may seem, irregular attendance and unattractive ap-

pearance were not cited as reasons for failure to adjust to the job.

Information concerning duties performed by employees revealed that the major emphasis in the secretarial course should be placed on typing, filing, dictation, keeping records, arithmetic, training in the use of the telephone, and meeting the public.

In the typing training, emphasis should be placed first on addressing envelopes and setting up letters; second, on typing numbers, tabulations, and filling in forms; third, on the typing of invoices and statements. Instruction in writing original letters should be included in the course.

Switchboard training, bookkeeping, dictaphone, duplicating, and the use of office machines should be surveyed in the secretarial course, but with less time spent in this training than on the previously mentioned subjects.

ACCORDING to the employers interviewed, the employees should have:

1. Knowledge of business papers, business terms, communication and transportation procedure, English, and office etiquette.

2. Skill in taking dictation and producing an accurate transcript, in typing accurately, in proofreading, erasing, and correcting copy, in figuring things out for themselves, and in finding material in the files.

3. An attractive personality, a well-groomed appearance, and personality traits of dependability, initiative, poise, judgment, and constructive attitudes, such as interest in the work and in the firm, and willingness to take responsibility.

The employers of San Diego want efficient workers, and are willing to
(Continued on page 246)

Shorthand

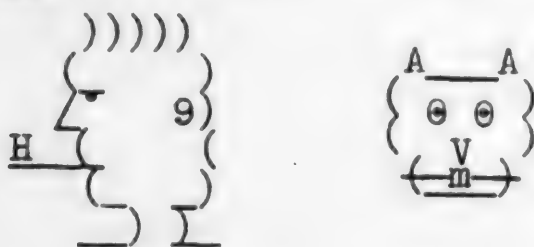
EVER since I was a junior in high school, the art of "painting" on the typewriter fascinated me—I looked upon the typewriter as a medium of artistic expression. At first, I designed simple little borders made with "x's":



Then followed more ornate borders, such as this one, made with parentheses, underscores, and "H's":

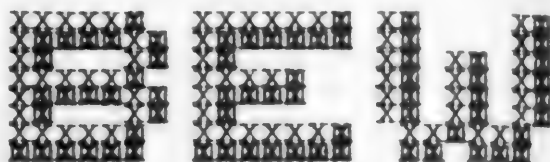


The next step was making little cartoon faces:



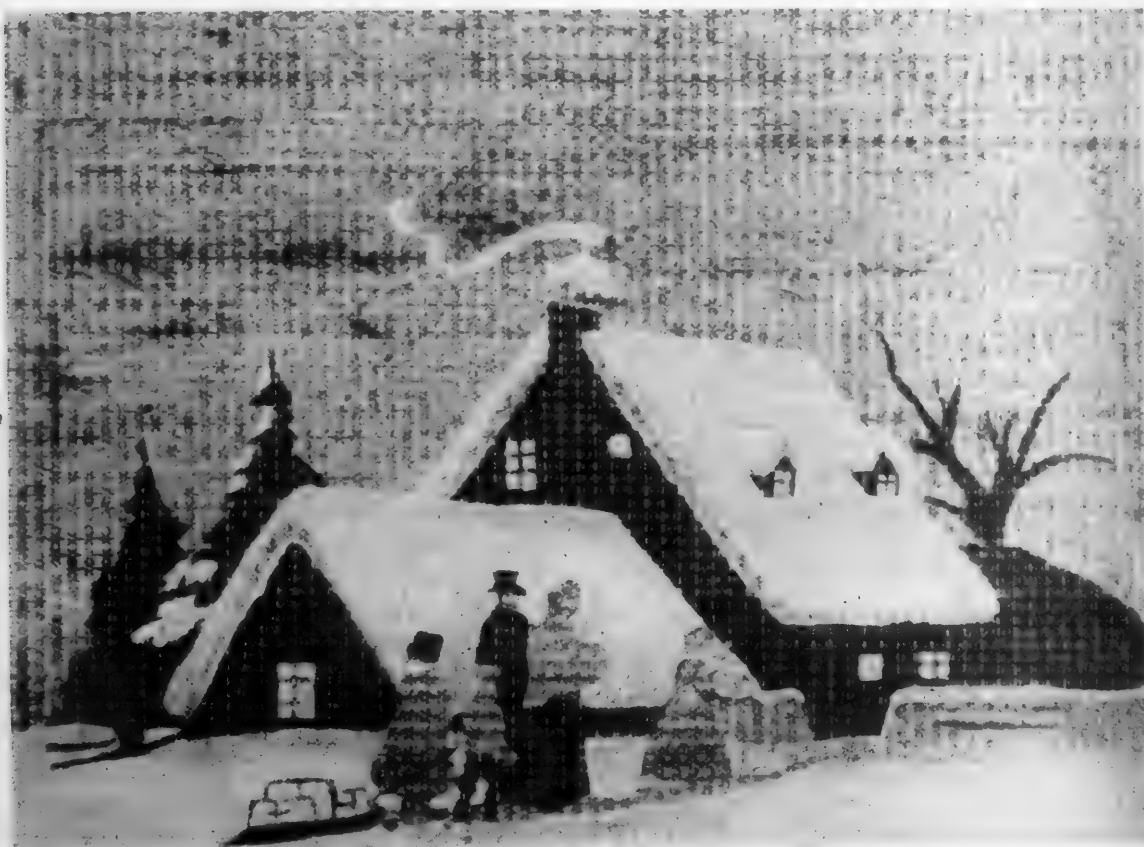
"Artyping" for

I was also able to produce unusual styles of alphabets, including several shaded styles like this:



My first portrait attempts consisted merely of outlines, or silhouettes, made with "x's"; but with practice, I began to reproduce portraits that looked like actual photographs. I found that such letters as "M's" and "N's" reproduced the darker shades, colons and periods the lighter shades, and "I's," "V's," and "Z's" the in-between shades. My portrait was typed with about 5,000 periods!

The design of the little boy at the door,



Hobbyists

JULIUS NELSON
Artistic Typing Headquarters
Baltimore, Maryland

shown here, is an excellent example of the more advanced forms of typewriter art, in that it employs two well-known techniques of shading: (1) the use of a variety of letters and characters and (2) striking over. Usually a design of this type is very lightly drawn in pencil, and then the pencilled lines are obscured by means of striking the various typewritten characters that go to make up the design. With the help of the variable line spacer, the carriage control, and the simple little period, the many curved lines comprising the picture seem to give the appearance of unbroken pen-and-ink lines. Some of the other letters and characters used in the design are dollar marks, number signs, "at" signs (@), asterisks, x's, and m's. This design was made by Camilla J. Jackley, a student of Sr. Mary Annice, O.S.F., St. Joseph's High School, Ashton, Iowa.

The winter scene, reproduced from the book, *Artying*, is a departure from the usual type of cut-out design in that the original is cut out from a sheet of carbon paper rather than from a sheet of blank paper. A sheet of onionskin is placed over the cut-out carbon. Underneath the carbon is placed a blank sheet of paper. The typist proceeds to strike the proper keys on the onionskin, thereby causing the carbon to leave an impression *only* where it is *not* cut out. Sometimes, as in the case of this design, it is necessary to go through two different typings with two differently cut-out sheets of carbon paper in order to obtain the proper effect. In this design the characters used were asterisk, x, and m. The cloudy background was obtained by smearing with the finger.

Some time ago Paramount Pictures, of Hollywood, heard of my work and sent one of their photographers to Windber, Pennsylvania, where I was teaching school at the time, to have me photographed as part of an "Unusual Occupations" short.

Interest in *Artying* has spread over the country as a result of national *Artying* contests, which I sponsor annually. The eighth



of these contests closed recently. As an additional means of stimulating interest in my hobby, I have constructed a series of designs—from the simplest to the most difficult—and have had them photographed on 35 mm. filmstrips, so they can be shown in schools.

In 1942, "Who's Who in America" gave *Artying* a boost by including a 21-line write-up in its Supplement.

If you are looking for a relaxing and fascinating hobby, try *Artying*!

Send pictures of your hobby with a short description. We will pay at the rate of \$6 a printed page for each write-up published. Address: HOBBY EDITOR, The Business Education World, 270 Madison Avenue, New York 16, New York.—Philip S. Pepe



Artying portrait and original photograph of the author, showing how accurately a protrait can be reproduced on the typewriter. The typed copy was made entirely with periods—5,000 of 'em!



IN THIS article, the fifth in a series appearing in the *BUSINESS EDUCATION WORLD* under the title "What Shall We Teach in Business Arithmetic?" an attempt is made to indicate where emphasis should be placed in teaching the arithmetic topics of interest, bank discount, and installment buying and to evaluate the real-life values of these topics.

INTEREST. Approach interest by explaining the meaning of the percentage form as used in interest calculation. Thus: Interest on \$1,500 at 6 per cent means that the charge or rental for borrowing \$1,500 for 1 year is 6 per cent of it, or \$90.

Show how interest is analogous to rent. Discuss types of banks and their functions.

Discuss the maximum legal rate of interest versus usurious rates. Explain that states limit the interest charge to protect the borrower. Show why this is necessary.

Show that interest is simply percentage with time introduced as an added factor. Explain that the 6 per cent interest rate is used as the basis for the 60-day interest method only because it is the legal rate in more states than any other rate. Show how any other rate would do. Contrast the ease, speed, and accuracy features of the 60-day interest method with the long multiplication and division operations often required by the cancellation method. Urge the use of the cancellation method only as a check on the accuracy of the results obtained by the 60-day method.

The 60-day and 6-day methods of determining interest at 6 per cent should be introduced by having students solve a problem such as interest on \$650 for 60 days at 6 per cent, allowing each student to use any method with which he is familiar. Then explain that the best method, and the one used in business, of figuring interest is the banker's, or 60-day, interest method. The method of finding the interest by this method should be explained as follows:

What Shall We Teach

R. ROBER

The interest on \$1 for 1 year at 6 per cent is 6 cents. If \$1 will earn 6 cents in 1 year, it will earn $\frac{1}{6}$ of 6 cents, or 1 cent, in $\frac{1}{6}$ of a year. $\frac{1}{6}$ of 1 year (360 days) = 60 days.

Therefore, the interest on \$1 for 60 days may be found by moving the decimal point in the principal (\$1) two places to the left. Thus: \$.01 = interest on \$1 at 6 per cent. This method of finding the interest at 6 per cent for 60 days may be applied to any principal.

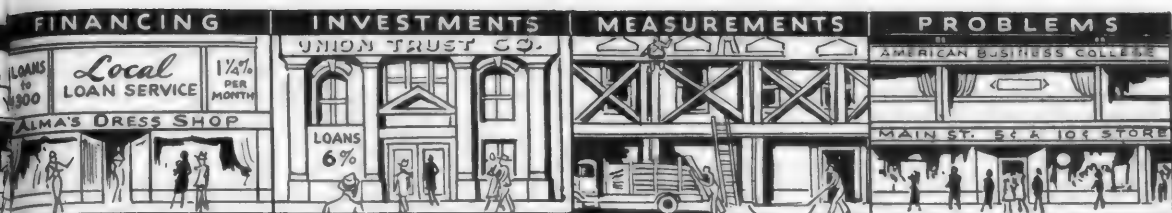
The cancellation method should be used in computing interest by the accurate-interest method. A 365-day year and the exact time must be used in computing accurate interest.

The accurate-interest method is always used by the United States Government in computing interest on its securities. It is also used quite often by bankers and by businessmen. Interest tables makes the computation of interest by this method easy.

Compound interest is simple banker's interest, which is added to the principal periodically and on which sum interest is computed for the next interest period. Show that it is interest computed on interest. Compound-interest and sinking-fund tables, although great timesavers and promoters of accuracy in arithmetical calculations, are not always available. For this reason, special emphasis should be placed on the value to the student of learning how to make these computations without the use of the tables.

Compound interest is not figured on amounts less than \$1 by most banks, and should not be so figured by the students.

The social values of the subject of interest can be shown, and an interesting project can be developed by appointing a committee to



Business Arithmetic?

ROSENBERG

get information from local banks as to rates of interest, opening of new accounts, services to the community, thrift movements, school savings banks, and so forth.

BANK DISCOUNT. In the subject of bank discount, it is well to review briefly the purpose and form of notes. Giving the student the reason for discounting notes will arouse his interest in the method of computing this discount.

Each student should fill in a blank note and draft. If these are not available, he should copy and complete a note and a draft. Show the value of notes as credit instruments. Discuss briefly the essentials of negotiable instruments, the effect of indorsements on notes, and the security value represented by notes as evidence of debt.

Since bank discount is a deduction made by a bank from the maturity value of a note for cashing or buying it before it is due, the student should be shown that this is simply an interest charge collected at the beginning of the interest period instead of at the end.

Emphasize the importance of accuracy in finding the date of maturity and the term of discount of a note, as an error in either of these two points will result in an error in the bank discount.

In finding the term of discount, never count the discount date (first day), but always count the date of maturity (last day).

All interest calculations in bank discount should be computed by the banker's 60-day interest method.

Emphasize the fact that the only difference between the procedure followed in determining the proceeds of non-interest-bearing notes and those of interest-bearing notes is that in

interest-bearing notes the interest on the note for the whole period must first be added to the principal; this new amount is then used as a basis for determining the bank discount and the collection charge.

The student should be shown that the proceeds of a draft are found in exactly the same way that the proceeds of a non-interest-bearing note are found, except that in a draft, payable a definite time after sight, the date of acceptance must be used instead of the date of the draft.

Very often a draft is made payable "after date" instead of "after sight." In such a case the date of maturity is found by counting the number of days or months given from the date of the draft.

The real-life values of the topic can best be shown by explaining: (1) that a bank earns its money by making loans on notes; (2) how sales are promoted by selling on credit secured by notes; (3) how home owners borrow money on notes; (4) why a knowledge of interest and discount computations is essential to a student of bookkeeping; (5) how an understanding of the preparation and use of notes and drafts is helpful in a study of commercial law; and so forth.

INSTALLMENT BUYING. The subject of installment buying should be introduced by a class discussion of the differences in the cash, the credit, and the deferred-payment methods of purchasing merchandise. This discussion should include the advantages and disadvantages of each method to the retailer and to the consumer.

The legal responsibility of each party in an installment sale should be explained; the right of the seller to regain possession of the goods, in case the buyer does not live up to his contract, should be discussed; and the additional financial liability of the buyer, although the retailer has repossessed the goods, should be stressed.

It has been claimed by many economic authorities that buying on the deferred-payment plan is good for the country as well as for the consumer. This claim is based on the theory that persons who might find it difficult or inconvenient to buy for cash will buy goods when they do not have to make full payment at the time of the purchase. The increased buying that results, the authorities say, means more manufacturing and, hence, the creation of jobs. It should be pointed out, however, that partial-payment buying may be harmful for a prospective purchaser, unless he first estimates how much more than the cash price he will have to pay if he buys on the installment plan and whether the goods are worth the additional cost; and second, whether he will be able to meet the periodic payments when they become due.

In introducing the arithmetical computations involved in installment buying, it is well to review briefly the subjects of percentage, interest, and discount.

The carrying charge, the amount by which the installment price exceeds the cash price, is made up of a sum that (1) gives to the seller a weekly or monthly return for the use of his money (interest on the unpaid balance); (2) includes the collection and added bookkeeping expenses; and (3) provides for losses on incomplete payments, the losses resulting when reclaimed articles are sold as secondhand goods.

Emphasize: (1) that the difference between the installment price and the cash price is, in fact, the interest charged to the buyer by the seller for the privilege of making periodic payments for merchandise; (2) that the difference between the installment price and the down payment may be considered as a loan made to the buyer by the seller; and (3) that the weekly or monthly payments may be considered as reductions of this loan until it is all paid back.

Stress the fact that it is common practice in business, when merchandise is sold on the deferred-payment plan payable in equal monthly installments, for the seller to collect interest on the unpaid balance at the time each monthly installment is collected. This plan is used by personal-finance companies.

Show how the computation of the interest rate on deferred payments is made easy by using the formula:

$$\text{Rate} = \frac{\text{Interest Charge}}{\text{Payment} \times \text{Time}}$$

Very often, when invoices for merchandise sold on account are past due, interest is charged. When this is done, it is customary to add to the sum of the on-account sales the interest on all past-due invoices from the due date to the date on which the entire account is paid. From this total is deducted the interest on each cash payment received on account from the date of such payment to the date of settlement, to find the amount necessary to pay the account in full.

When the interest due on unpaid monthly balances or on past-due invoices is computed, the banker's 60-day interest method is used.

The time for the interest period on unpaid monthly balances is computed by the compound-time method, using a 30-day month and a 360-day year.

The time for the interest period on past-due invoices is computed by the exact-time method.

The value of installment buying within the student's experience can best be shown by explaining that few houses are purchased for cash, their payments usually extending over many years; that other articles, such as automobiles, vacuum cleaners, books, furniture, refrigerators, radios, pianos, and washing machines, are bought on the installment plan with the payments extending over six, twelve, and eighteen months, and often longer periods; that, although there are disadvantages to this method of buying (very often excessive interest charges are made), the privilege of installment buying makes available to people of small means many necessities and luxuries, which they could not otherwise obtain. The students should be shown that all benefits do not accrue to the buyer only. The retailer, the wholesaler, and the manufacturer also benefit through increased sales.

The class discussion may be supplemented by installment-sales advertisements, brought in by the students and by the instructor, and by a recounting of installment-buying experiences known to the instructor.

POINTED OBSERVATION • Getting an idea should be like sitting down on a pin: it should make you get up and do something.—*E. L. Simpson, "Eye Witness"*

The BUSINESS EDUCATION WORLD

PROFESSIONAL NOTES

TEACHING BOOM • Three practical things to do about the teacher shortage have emerged out of the discussions that have held the attention of American educators:

1. Long range: **DR. W. E. PEIK**, head of the NEA emergency teacher-education commission, believes that the supply of teachers will increase when guidance staffs "talk up" teaching to students. He believes that schoolmen have sold short their own profession and urges counselors to "sell" teaching as a career.

2. Short range: Scholarships to prospective teachers have been found effective in attracting recruits. For example, in Florida 500 graduates of high schools were given, and accepted, scholarships to teacher-training institutions.

3. Immediate: **DR. J. H. KUSNER**, president of the newly established Farragut (Idaho) College, went to Washington, D. C., set up a teacher-recruitment office in his hotel room, advertised in a newspaper that he was looking for college teachers, and received scores of applications from Government employees and Army and Navy officers on terminal leave. In a day or two he had signed up ten teachers.

Another suggestion comes from Neosho, Missouri, where the Board of Education bought a stately frame house, furnished it, installed automatic heat, and converted it into a teacherage. The house accommodates eight women teachers at \$3 a week each. Needless to say, the teachers are delighted.

TERMINATION • The study that should end all studies of education in the armed services during the war is finally going to press. After two years of research, the commission studying Army and Navy teaching methods is now putting its finishing touches on ten different manuscripts treating selected aspects of teaching and learning in the armed services.

Advance glimpses into the manuscripts, it is reported, show that the findings of the commission will be of practical value to school administrators on all levels. But, says **GEORGE ZOOK**, president of the American Council on Education: "The education programs of the armed services will not revolutionize civilian education . . . An equally good volume might be written on the contribution of civilian education to the armed services."

COLOR • Color engineers predict that textbooks in the near future may be printed with gray ink on yellow or green paper. Printing black on white, they say, is just an accident from the days when little was known about color. Black on white does give great contrast—too much contrast, for it is fatiguing to the eyes. Gray on yellow paper can be read with comfort even in the smallest type.

Color experts are opening up amazing secrets concerning the effects of color upon people, and practical schoolmen are beginning to take part in the "color revolution." One Wisconsin high school principal says that proper use of color in classrooms reduced teacher absenteeism from thirty days to three days within a few months. Experiments claim that use of the right color reduces nervous tension and affects blood pressure, muscular action, mental activity, and individual moods.

VETERAN ATTITUDES • The veterans of World War II have better attitudes toward their jobs, their employer, and the company than do nonveterans, a survey of employee morale conducted by the Benge Associates has revealed.

Probably some of this spirit can be accounted for as relief from regimentation, Eugene Benge, president of the Associates, speculates. He continues, "Veterans are returning with new hopes and new viewpoints, resulting in high, expectant morale." Benge found that morale of veterans formerly employed by other companies and of those not employed before the war is higher than that of veterans merely returning to their old jobs.

LINE-UP • Washington educational leaders have a favorite game: speculation about "Who's for?" and "Who's against?" the Murray Education Development Act of 1947. (Refer to page 101, October B.E.W.) Current consensus of opinion lists the National Education Association as opposed, because the bill would give public funds to nonpublic schools; the American Vocation Association as opposed, because it wants legislation for trade training kept separate from general education; the AFL, AFT, and CIO as favoring; and the National Catholic Welfare Conference as favoring, provided its suggestions for changes are included.

Organizations

DELTA PI EPSILON • Members of **ALPHA CHAPTER** (New York University) have two distinctions in the fraternity: they belong to the oldest chapter, and at present they represent the greatest number of states—twenty-nine, plus Washington, D. C., and Puerto Rico. In a summer initiation, Alpha inducted seventeen new members representing twelve states:

Stanley Robinson, Illinois; Vernon V. Payne, New Mexico; Tom Rose, Texas; Clyde Humphrey, Washington, D. C.; Earl F. Rock, New Jersey; Earl G. Nicks, Virginia; Mildred Meius, California; Elizabeth McCullough and Agnes Baron, Ohio; Ivan Calton, Missouri; Emily Hancock, Florida; Genevieve Mahfood and Ethel Higgins, Pennsylvania; and Eleanor Tubbs, Margaret Nash, Helen Ferkanin, and Mildred Ascherl, all from New York.

A.V.A. • When the American Vocational Association meets in St. Louis (December 4-7) there will be both joint and separate meetings for teachers of office occupations and retail occupations.

One highlight of the Education-for-Business meetings will be "St. Louis Writes a Blueprint for Business Education" under the chairmanship of J. S. NANTZ, assistant superintendent of St. Louis Schools.

TRI-STATE • The fall convention of the Tri-State Commercial Education Association, originally planned for October 4 and 5 but canceled at the last moment because of the power and hotel strikes in Pittsburgh, has now been postponed until next spring.

ALFRED QUINETTE, president of the Association, reports that the complete program will be held in the deferred meeting at the Hotel Statler in Cleveland.

NBTA • Business is scrutinizing modern educational practices, and by Christmas time, when the National Business Teachers Association meets in the Hotel Sherman in Chicago, business will be ready to report its findings to business teachers. Spokesman will be **OAKAH L. JONES**, president of **NOMA**, who will address the convention as soon as **PRESIDENT BENJAMIN HAYNES** formally opens the first general assembly on December 26.



BENJAMIN HAYNES



OAKAH L. JONES

Immediately following Mr. Jones' address, former Senator **JAMES P. POPE** (now a director of the Tennessee Valley Authority) will speak on "The Control of Atomic Energy." In view of the part that TVA played in the development of the atomic bomb, Mr. Pope's remarks should be particularly pertinent and are certain to attract international attention.

In specific professional areas of business education, several panels have been planned.

The three-day convention (December 26, 27, and 28) will also include a reception on Thursday, December 26, and a banquet on Saturday evening.

The annual dues (\$2), which entitle members to full convention privileges, a copy of the yearbook, and a subscription to the quarterly magazine, *American Business Education*, are now being received by the Association's treasurer, J. Murray Hill, Bowling Green (Kentucky) Business University.

NBTA SPECIALS • Coincident with the NBTA meetings in Chicago, several special meetings and dinners will be held by groups that expect a large membership to be in Chicago for the convention.

Pi Omega Pi will hold a business meeting on Thursday afternoon and a dinner later. Time and place of both meetings will be announced at the convention by *Pi Omega Pi* President, **RUTH ROBERTS**.

Delta Pi Epsilon will hold its annual lecture and dinner at 6:30 on Friday evening in the Crystal Room at Hotel Sherman.

Michigan Breakfast will be announced at the convention.

Teachers' College (Columbia University) will have a luncheon at 12:15, Friday in the Rose Room of Hotel Sherman. Reservations are to be made with **DR. FORKNER** at the convention.

Pitt Reunion for graduates and students of the University of Pittsburgh will be held from 10:30 to 12:30 Friday night. Place will be announced by **DR. LESSENBERRY** at the convention.

Participants in the NBTA Convention, Dec. 26-28

NAME	AFFILIATION	PARTICIPATION	DEPARTMENT MEETING
Agnew, Peter L.	New York University	Panel Member (Goals)	Machines, Sat. p.m.
Alexander, E. W.	Central (St. Louis) H.S.	Address (Management)	Sec. Sch., Fri. p.m.
Baker, Bernard F.	Chicago Supervisor	Panel Member (Goals)	Machines, Sat. p.m.
Baker, Maurice	University of Kentucky	V. Ch., D.E. Round Table	Distributive, Sat. p.m.
Barnhart, W. S.	Emmerich (Ind.) H.S.	Panel Member (Expanding)	Admin., Sat. p.m.
Barron, Allan E.	Wyandotte (Mich.) H.S.	Panel Member (Devices)	Bookkeeping, Sat. p.m.
Beighey, Clyde	Western Ill. State T. C.	NBTA Vice-President and Membership Director	Social-Bus., Sat. p.m.
Bitner, Dorothy M.	Bakersfield (Calif.) H.S.	Panel Member (Evaluation)	Distributive, Sat. p.m.
Brickner, John C.	University of Indiana	Secretary, D.E. Round Table	Distributive, Sat. p.m.
Cain, T. B.	West Virginia Bus. Col.	NBTA, Vice-President	Priv. Sch., Sat. p.m.
Carmichael, V. H.	Ball State Teach. Col.	Panel Member (Devices)	Bookkeeping, Sat. p.m.
Chapman, Ivan	Detroit Board of Education	NBTA Liaison Officer	Machines, Sat. p.m.
Clevenger, Earl	Central (Okla.) St. Col.	Debate: (Revision)	Social-Bus., Sat. p.m.
Connelly, Eva L.	Brown's School of Business	Address (Teach Shorthand)	Priv. Sch., Sat. p.m.
Cooper, Agnes P.	Knoxville Business College	Address (Advantages)	Priv. Sch., Sat. p.m.
Corey, Stephen	University of Chicago	Address (Visual Aids)	College, Fri. p.m.
Crawley, Kermit	Stevens College	NBTA Publicity Director	
Dallas, W. G.	Ashland (Ohio) H.S.	Ch., D.E. Round Table	Distributive, Sat. p.m.
Deal, Robert J.	Jones (Chicago) H.S.	Pictorial Demonstrations	Machines, Sat. p.m.
Delancey, Opal H.	Evansville College	Ch., Machines Round Table	Machines, Sat. p.m.
Diekroeger, L. H.	Hadley (St. Louis) T.H.S.	Pres., Sec. Sch. Dept.	Sec. Sch., Fri. p.m.
Dodds, Thomas M.	Bryant and Stratton	V. Ch., Bkkg. Round Table	Bookkeeping, Sat. p.m.
Douglas, Lloyd V.	Iowa State Teach. Col.	NBTA Executive Board	College, Fri. p.m.
			Distributive, Sat. p.m.
Ellison, Milton	Battle Creek (Mich.) H.S.	Panel Member (Evaluation)	Distributive, Sat. p.m.
Enterline, H. G.	Indiana University	Ed., <i>American Business Education Magazine</i>	
Ettinger, Clifford	BEVA	Panel Member (Vis. Aids)	College, Fri. p.m.
Eyster, Elvin S.	Indiana University	Address (Guidance)	Sec. Sch., Fri. p.m.
		Yearbook Commission	
Finch, Robert	Cincinnati Board of Ed.	NBTA Executive Board	Secretarial, Sat. p.m.
Finkelhor, Dorothy	Business Training College	Panel Member (Planning)	Assembly, Sat. a.m.
Fisk, McKee	McGraw-Hill Book Co.	Panel Member (Planning)	Assembly, Sat. a.m.
Forkner, Hamden L.	Columbia University	Address (Future Workers)	Sec. Sch., Fri. p.m.
Freeman, M. H.	Paterson (N. J.) T.C.	V. Ch., Debate: (Revision)	Social-Bus., Sat. p.m.
		Summary on Debate	Social-Bus., Sat. p.m.
		Editor Joint Yearbook	
Fries, Albert C.	Northwestern University	Chairman, Local Committee	
		V. Ch., Admin. RT	Admin., Sat. p.m.
Garrett, R. Norval	Southeastern La. College	Sec'y., Admin. Round Table	Admin., Sat. p.m.
		Panel Member (Expanding)	Admin., Sat. p.m.
Gaynor, Muriel	Iowa State Teach. Col.	Panel Member (Evaluation)	Distributive, Sat. p.m.
Gibson, E. Dana	New Mex. Highlands Univ.	Panel Member (Vis. Aids)	College, Fri. p.m.
		Address (Visual Aids)	Secretarial, Sat. p.m.
		Address (Personal Use)	Sec. Sch., Fri. p.m.
Given, John N.	Los Angeles Supervisor	Panel Member (Planning)	Assembly, Sat. a.m.
		Panel Ch. (Expanding)	Admin., Sat. p.m.
		Yearbook Commission	
Goodfellow, R. C.	Newark Board of Ed.	Address (Visual Aids)	College, Fri. p.m.
Hadsell, R. S.	Yale University	Panel Member (Vis. Aids)	College, Fri. p.m.
Hall, Forest R.	University of Wyoming	Debate: (Revision)	Social-Bus., Sat. p.m.
Harms, Harm	Capital University	Ch., Secretarial Round Table	Secretarial, Sat. p.m.
Hatfield, E. E.	University of Oklahoma	President, NBTA	Assemblies
Haynes, Benjamin R.	University of Tennessee	Address (Time Studies)	Machines, Sat. p.m.
Hermann, Irvin A.	Servel, Incorporated	Panel Member (Goals)	Machines, Sat. p.m.
Hermann, Joseph	Workman Service, Inc.	Secretary, NBTA	All registrations
Hill, J. Murray	Bowling Green Bus. Univ.	Toastmaster	Banquet, Sat. eve.
		Panel Ch. (Visual Aids)	College, Fri. p.m.
Holley, J. Andrew	Oklahoma A. & M.	Panel Member (Evaluation)	Distributive, Sat. p.m.
Hookey, G. Elwood	Terre Haute Co-ordinator		

NAME	AFFILIATION	PARTICIPATION	DEPARTMENT MEETING
Huff, Nettie M.	Huff College	NBTA Executive Board	Priv. Sch., Fri. p.m. Admin., Sat. p.m.
Humphrey, Clyde	U. S. Office of Education	Panel Member (Vis. Aids)	College, Fri. p.m.
Jackson, A. R.	Beacom College	Chairman, Priv. Sch. Inst.	Priv. Sch., Sat. p.m.
Jones, Oakah L.	President, NOMA	Address (Business Views)	Assembly, Fri. a.m.
Keithley, Erwin M.	University of California	Vice-Pres., Sec. Sch. Dept.	Sec. Sch., Fri. p.m.
Kincaid, J. K.	Miller School of Business	President, Priv. Sch. Dept.	Priv. Sch., Fri. p.m.
Larson, L. C.	Indiana University	Address (Visual Aids)	College, Fri. p.m.
Leffingwell, Elsie	Kent State College	Secretary, Secretarial RT	Secretarial, Sat. p.m.
Lessenberry, D. D.	University of Pittsburgh	Panel Chairman (Problems)	Sec. Sch., Fri. p.m.
		Panel Chairman (Planning)	Assembly, Sat. a.m.
Linskey, Mildred	Farragut (Chicago) H.S.	Panel Member (Goals)	Machines, Sat. p.m.
Logan, Virginia	Lockyear's Bus. College	Sec'y., Priv. Sch. Dept.	Priv. Sch., Fri. p.m.
Lomax, Paul S.	New York University	Address (Planning)	Assembly, Sat. a.m.
Luther, A. M.	Knoxville Bus. College	Vice Ch., Priv. Sch. Inst.	Priv. Sch., Sat. p.m.
Meehan, Agnes	Washington (Ind.) H.S.	Sec'y., Machines Round Table	Machines, Sat. p.m.
Meyer, Harvey J.	Mackenzie (Detroit) H.S.	Ch., Bkkg. Round Table	Bookkeeping, Sat. p.m.
Miller, F. J.	Tiffin University	Address (Improved Stand.)	Priv. Sch., Fri. p.m.
Mitchell, Ivan	Western (Detroit) H.S.	NBTA Executive Board	Sec. Sch., Fri. p.m.
		Panel Member (Planning)	Assembly, Sat. a.m.
		NBTA Executive Board	Bookkeeping, Sat. p.m.
		Debate: (Revision)	Social-Bus. Sat. p.m.
Must, Paul	Bowling Green University	Panel Member (Evaluation)	Distributive, Sat. p.m.
Natalizio, A. J.	Waukesha (Wis.) Voc. Sch.	Panel Member (Vis. Aids)	College, Fri. p.m.
Packer, Harry Q.	W. Va. State Supervisor	Panel Member (Evaluation)	Distributive, Sat. p.m.
Pearson, C. Edwin	Decatur (Illinois) H.S.	NBTA Convention Editor	
Pendery, John A.	South-Western Pub. Co.	Debate: (Revision)	Social-Bus., Sat. p.m.
Polishook, W. J.	South Orange (N.J.) H.S.	Address (Atomic Energy)	Assembly, Fri. a.m.
Pope, James P.	Director, TVA	NBTA Treasurer and Ex-	
Price, Ray G.	University of Cincinnati	hibit Manager; President,	
		College Department	College, Fri. p.m.
Puckett, Cecil	University of Denver	Panel Member (Goals)	Machines, Sat. p.m.
Randall, Mrs. S.	Green Bay Bus. College	Sec'y., Priv. Sch. Inst.	Priv. Sch., Sat. p.m.
Reigner, Charles	H. M. Rowe Company	Address (Broadening Serv.)	Priv. Sch., Fri. p.m.
		Address (Public Service)	Priv. Sch., Sat. p.m.
		Yearbook Commission	
Rice, Louis A.	Packard School	Panel Ch. (Evaluation)	Distributive, Sat. p.m.
Richert, G. Henry	U. S. Office of Education	Sec'y., Sec. Sch. Dept.	Sec. Sch., Fri. p.m.
Riggs, C. M.	Saginaw (Mich.) H.S.	Panel Member (Devices)	Bookkeeping, Sat. p.m.
Robbins, W. A.	Lincoln School of Com.	Address (Business Wheels)	Priv. Sch., Fri. p.m.
Roberts, W. M.	Tyler Commercial College	Panel Member (Planning)	Assembly, Sat. a.m.
Roell, Florence	Adams (South Bend) H.S.	Vice-President, Priv. Sch.	Priv. Sch., Fri. p.m.
Ruley, S. E.	Spencerian Com. School	Debate: (Revision)	Social-Bus., Sat. p.m.
Salsgiver, Paul	Simmons College	Vice Ch., Machines RT	Machines, Sat. p.m.
Seay, Paul H.	Withrow (Cincinnati) H.S.	Debate: (Revision)	Social-Bus., Sat. p.m.
Shields, Harold	University of Chicago	Panel Member (Expanding)	Admin., Sat. p.m.
Shilt, Bernard A.	Buffalo Supervisor	Sec'y., Social-Business	Social-Bus., Sat. p.m.
Silverstein, P.	Hughes (Cincinnati) H.S.	Ch., Adm. Round Table	Admin., Sat. p.m.
Sipe, J. Marvin	University of Houston	Address (Good Business)	Sec. Sch., Fri. p.m.
Staehle, J. C.	Director, Aldens, Inc.	Vice-Pres., Col. Dept.	College, Fri. p.m.
Straub, Lura L.	University of Wyoming	Panel Member (Goals)	Machines, Sat. p.m.
Strong, Earl P.	Remington Rand, Inc.	Address (Teaching, Plus)	Sec. Sch., Fri. p.m.
Sutton, Lydia	Detroit Commercial H.S.	Address (Research)	Secretarial, Sat. p.m.
Tidwell, Fred	University of Oklahoma	Ch., Social-Business	Social-Bus., Sat. p.m.
Tonne, Herbert A.	New York University	Ch., Debate: (Revision)	Social-Bus., Sat. p.m.
		Panel Member (Goals)	Machines, Sat. p.m.
		Address (Visual Aids)	College, Fri. p.m.
Wagoner, George	Indiana University	Panel Chairman (Devices)	Bookkeeping, Sat. p.m.
Wales, Hugh	University of Cincinnati	Sec'y., College Dept.	College, Fri. p.m.
Waring, Archie D.	Walsh. Inst. of Accounting	Panel Member (Expanding)	Admin., Sat. p.m.
Wessels, O. R.	Syracuse University	V. Ch., Secretarial R. T.	Secretarial, Sat. p.m.
White, Raymond	University of Oklahoma	Pictorial Demonstrations	Machines, Sat. p.m.
Whitmore, Irol	Indiana University	Panel Chairman (Goals)	Machines, Sat. p.m.
Wilkinson, Arthur	Jones (Chicago) H.S.	Sec'y, Bkkg. Round Table	Bookkeeping, Sat. p.m.
Wilson, W. Harmon	South-Western Pub. Co.		
Winterrowd, Effie	Indiana Central College		

Appointments

PRINCIPALS • DR. JOHN V. WALSH, formerly a business teacher and until recently principal of Flushing High School, has been appointed to the principalship of the largest high school in New York City, the DeWitt Clinton High School . . . from business classrooms to principalships in Dallas, Texas: ROBERT H. MCKAY, Sunset High School; and H. W. MUNROE, Greiner High School.

PHILADELPHIA • Changes at the Peirce School of Business Administration: DEAN JOHN A. LUMAN, who has headed the school for the past fifty years, has retired as Dean Emeritus. WILLIAM J. HAMILTON, recently co-ordinator of the co-operative retail training program of the Upper Darby (Pennsylvania) Schools and formerly supervisor of business education in Philadelphia evening schools, has been appointed in Dr. Luman's place.

GEORGIA • HARRY HUFFMAN, who has been doing experimental work in typewriting instruction at the Horace Mann-Lincoln School of Teachers College, Columbia University, for the past two years, to associate professorship and chairmanship of the Division of Business Education at the Collegeboro Teachers College.



HARRY HUFFMAN

CALIFORNIA • DR. JESSIE GRAHAM, promoted from supervisor of business education, Senior High School Division, of Los Angeles Schools, to supervisor of business education, Adult and Vocational Education Division. In her new position, Dr. Graham's work will cover the Metropolitan School of Business, City College of Los Angeles, the junior colleges, and the evening schools . . . EDWIN A. SWANSON, from head of the Department of Commerce at Arizona State College, to staff of the Commerce Department of the San Jose (California) State College . . . ERWIN M. KEITHLEY, recently president of the NEA Department of Business Education and instructor at Milwaukee's South Division High School, to position as lecturer in office management at the University of California at Los Angeles . . . KENNETH COFFIN, formerly of the naval training staff at Indiana University and more re-

cently from Greencastle, Indiana, to assistant professorship in business education at San Jose State College.

OKLAHOMA • To Oklahoma A. & M. College, at Stillwater: LLOYD GARNER, from the North Texas State College, to associate professorship in secretarial administration; MARJORIE GILBERT, formerly a WAVE instructor at the Navy school at Stillwater, to instructorship in secretarial administration; and ROBERT A. LOWRY, from head of the Division of Commerce of Panhandle A. & M. College (Goodwell, Oklahoma), to associate professorship of business education and editorship of the *Review of Business Education*, quarterly journal for Oklahoma business teachers. To Central State College, at Edmond: M. L. BAST, to head of the Business Education Department; RALPH REED, recently with the Air Transport Command, to assistant professorship in commerce; MARTHA JONES RODRIGUES, to head of the Stenographic Department; and MILDRED HELLER, to instructorship in typewriting.



RALPH REED

NEW YORK • F. NEWTON HAYES, until recently dean of ex-service students at Bryant College in Providence, Rhode Island, to dean of admissions at the new Associated Colleges of Upper New York at Plattsburgh . . . E. JANE WHITEMAN, for the past four years acting director of the Russell Sage College, School of Business, in Troy, to full directorship of the school . . . To Adelphi College: DOROTHY E. THOMAS, as assistant professor in the college's co-ordinated merchandising program; and CHARLES SCHWARTS, as accounting instructor.

DENVER • New appointees to the staff of the University of Denver include: FRANCES M. CHAPMAN, formerly dean of women of Trinidad Junior College, to instructorship in secretarial science . . . JESSE E. REYNOLDS, formerly vocational and educational counselor of the Corpus Christi (Texas) Public Schools and a practicing accountant, to assistant professorship of accounting . . . LOUIS HOUGH, formerly associate professor of economics at Miami University, to associate professor of economics and finance . . . JOHN MAURICE SOARES, from an assistant professorship at the Flagstaff (Arizona) State Teachers College and

more recently from the Army, to assistant professorship of business education and secretarial science . . . DR. VERNON A. MUSSELMAN, former assistant professor of business education at the University of Oklahoma, to associate professorship of business education and accounting. In addition to his teaching duties, Dr. Musselman will relieve DR. CECIL PUCKETT as director of instruction in the College of Business Administration. Dr. Puckett, long an active member of the University administrative staff, to the chairmanship of the Department of Secretarial Science in addition to his duties as head of the Department of Business Education . . . LAWRENCE F. FISHER and KENNETH L. SMITH, both Certified Public Accountants, to professorships in accounting.

PROMOTIONS • CHARLES E. BOYER, formerly supervisor of business education in the Johnstown (Pennsylvania) public schools, has been promoted to the principalship of the Johnstown High School. He has been succeeded in the supervisorship by RAYMOND W. MORGAN.

L. H. DIEKROEGER, until recently on the St. Louis Board of Examiners, has been promoted to assistant principal of Hadley Technical High School. Mr. Diekroeger succeeds E. W. ALEXANDER, new principal of Central High School, St. Louis.

OTHERS • RICHARD L. WILLIAMSON, from the University of Buffalo, to instructorship in Economics at Wheaton (Illinois) College . . . C. C. DAWSON, from head of the Department of Business Education at Berea (Kentucky) College to head of the Department at Mississippi Southern College, Hattiesburg . . . H. L. WALDRON, to head of Business Administration Department at the Ohio Northern University, Ada . . . WILSON T. ASHBY, to head of the Business Education Department at State Teachers College, Florence, Alabama.

People

ADDITIONS • New names to add to the list of State and City Supervisors of Business Education, published in the October B.E.W., include:

KANSAS: H. D. Shotwell, State Supervisor of Vocational Education in Office Practice, Topeka High School, Topeka.

MARYLAND: Thomas M. Greene, Supervisor of Business Education, Office of the State Superintendent of Education, Lexington Building, Baltimore.

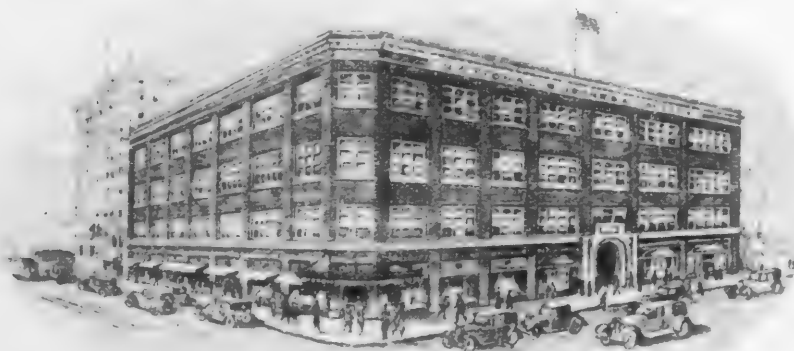
PENNSYLVANIA: S. Gordon Rudy, Chief of Business Education, Department of Public Instruction, Harrisburg.

Johnstown: Raymond W. Morgan, Supervisor of Commercial Education, Senior High School Building.

DIAMONDS • This is a year of anniversaries for E. M. COULTER, retiring president of National Business College, of Roanoke, Virginia: on July 30 he celebrated his seventy-fifth birthday; on September 1 he rounded out an even fifty years—to the day—with the school; and this year his college, one of the largest commercial schools in the South, celebrated its sixtieth year.

Mr. Coulter is being succeeded, as president by M. A. SMYTHE, who has been with the school for 43 years. Mr. Coulter's son, MURRAY, a lieutenant colonel with a five-year war record and a Bronze Star decoration, has become vice-president of the school.

In his long presidency, Mr. Coulter has seen the college grow from 125 to 600 students; its patronage spread to 18 states and 2 foreign countries; its curriculum develop from the six-month course of yesteryear to its present two-year secretarial and business administration curricula. Joining the staff of the school as an instructor in 1896, Mr. Coulter purchased a half interest in 1898 and three years later purchased the other half. Although he has retired to his farm near Roanoke, Mr. Coulter will retain his financial interest in National.



National Business College,
Roanoke, Virginia

One of the leading penmen in the United States, Mr. Coulter became interested in ornamental penmanship as a boy—he still likes to practice, and this past year taught an advanced class of penmanship in his own school. Penmanship earned him his first livelihood and helped him through Kansas Normal College (Fort Scott, Kansas): he inscribed beautiful visiting cards!

Audio-Visual Aids

MONOGRAPH • *The Use of Audio-Visual Aids*, the first of ten manuscripts reviewing armed-service training practices, will be off the press on January 1. M. M. CHAMBERS, hard-working editor of the series for the American Council on Education, says that the Army and Navy invented little new in the use of visual aids, but demonstrated on the largest possible scale the effectiveness of mechanical teaching devices.

MODELS • Educational Foundations, Inc., at One Hanson Place, Brooklyn, New York, distributes free of charge miniature model stores with empty cans, display cartons, imitation money, and teaching aids. Although designed for use in elementary schools, the materials are suitable for studying store arrangement and window displays.

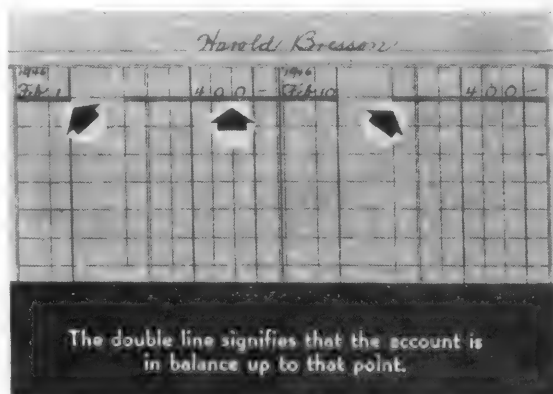
EXPEDITION • The International Film Foundation (1600 Broadway, New York City) has dispatched another American Expeditionary Force to Europe: a documentary-film expedition to visit postwar Europe, to make a series of significant motion pictures on the life and people of Czechoslovakia, Italy, France, and possibly Yugoslavia. Near future should bring excellent classroom materials.

RADIO • "The public has spent \$25 for radio receiving equipment for every \$1 which the broadcasters have spent for transmitting equipment. For upkeep, listeners pay \$3 for every \$2 spent by advertisers, and in addition foot the advertiser's bill through purchase of his goods and services." So speaks JEROME H. SPINGARN, formerly of the FCC, who, in a ten-cent pamphlet entitled *Radio Is Yours* (published by Public Affairs Committee, Inc.) urges radio listeners to keep control of radio programs. You "can ask the FCC to hold a hear-

ing on the (radio) station's application for a renewal and appear as a witness . . ." and so make your voice heard.

BOOKKEEPING • BEVA, the visual-aids firm recently established by DR. CLIFFORD ETTINGER to create a clearing house and production center for business-education films, has announced production of its first series: six silent filmstrips for first-year bookkeeping and accounting courses.

1. *Introduction To Accounting*
2. *The Accounting Cycle*
3. *How To Balance Accounts*
4. *The Journal* (first lesson)
5. *Posting* (one journal, one ledger)
6. *Controlling Accounts*



This frame from *How To Balance Accounts* is typical of the clarity and highlighting that characterize the new BEVA silent filmstrips.

Selling at \$5 each, the filmstrips are available from BEVA, 330 West 72d Street, New York 23, New York, and may be shown in any 35 mm. filmstrip projector. Produced under the personal direction of Dr. Ettinger, they are among the first to bring to classrooms the advantages of filmstrip-production techniques developed in the armed forces.

The content of every filmstrip is outlined in an initial index frame. The aim of each picture is clearly stated and is achieved by a variety-giving mixture of photographs, cartoons, title frames, and illustrative diagrams. Spot-lighting of significant elements, plus constant subtitles clearly printed (see illustration), make the views genuinely meaningful.

Uniquely, provision is made for pupil participation by means of direct questions and by providing model accounts, which the student may copy from the screen (the pictures are vivid enough to be clear in even a lighted classroom).

Books

APPRAISING BUSINESS EDUCATION, The American Business Education Yearbook, Volume III, 1946. Joint publication of the Eastern Commercial Teachers Association and the National Business Teachers Association, 334 pages, New York University Bookstore: \$2.50.

THEODORE WOODWARD

George Peabody College for Teachers
Nashville 8, Tennessee

Few of us realize the important contribution made by that great educational institution, The Yearbook. Volumes of yearbooks line our professional library shelves. Most of us dip into them occasionally to follow our pet ideas or note the writing of a favorite author. But did you ever read one, cover to cover, or ever study one, page by page? Try it; it's a revelation. A good yearbook can be a modernization "course." More flexible than a standard textbook, a yearbook can present a broad, up-to-date, personal overview of current thinking.

The 1946 American Business Education Yearbook, *Appraising Business Education*, is objective proof of this observation: it is a one-volume, up-to-date course on methods and problems in business education.

"But I don't need such a course!" you exclaim? Then, try the professional knowledge exam given on the next page!

Appraising Business Education is the third joint publication of the ECTA and the NBTA. It rings the bell on many counts: It is a synopsis of current thinking about objectives in business education—their appraisal and their attainment. It is a cross section of recent research and professional opinion of concern to business educators. It is a sort of graduate refresher course for every classroom teacher who wants to appraise *himself* and his standing in relation to the trends of today. It overflows with ideas to help you improve your instruction and appraise the results. It is—believe it or not—specific, practical, stimulating.

The purposes of *Appraising Business Education* are to identify the objectives of business education; to identify the contribution business education can make to general education; to illustrate how schools may appraise and determine their objectives; and, in the light of these findings, to suggest methods schools may use to achieve them.

These are mighty purposes. You and I have

objectives, but we need constant reminders to keep them clear, fresh, challenging. Incredibly, this yearbook fulfills its purposes, thanks to fine editing and a careful organization of the material: It is divided into three parts: Part I, three chapters, identifies objectives; Part II, five chapters, tells how to appraise your own objectives; and Part III, ten chapters, gets right into our classrooms and tells how to improve our instruction, so that we can attain the objectives. One, two, three—it is as simple as that.

OBJECTIVES • Objectives, of course, have to be based on our philosophy of why we are teaching what we are. Right in the first chapter the priority of philosophy is recognized: "A conscientious effort must be made to conceive a sound philosophy of business education as the first step in . . . arriving at . . . definite objectives. . . ." Having defined a we-are-part-of-general-education philosophy, the chapter goes on to analyze recent studies on objectives, to report an original research, and to summarize eight weighty objectives—all in harmony with current philosophy and aims of secondary education.

After reading Part I, the following concept of objectives and their importance in our day-by-day teaching is presented: we are taking a trip and we need a map. Our destination is the general objective of an informed and competent citizen and worker. Our route is determined by our philosophy of education. The cities and towns through which we pass are the intermediate objectives. Without a map, we may wander all over the countryside because crossroads and bypaths may prove to be too interesting, and consequently never reach our destination, our objective. Knowing our objectives, our teaching is direct.

In enumerating specific objectives, the yearbook presents two rich chapters—"What Is Vocational Business Competency?" and "What Is Basic Business Competency?"—that every teacher should be required to outline on paper. Doing this will force him to appraise his own classroom standards.

APPRAISAL • Part II follows logically with suggestions for the appraisal of your own school or classroom. If you have wanted to test the objectives of *your* program, you will find much valuable help here. Are you interested in trends in business offices? You will be brought up to date, probably with a jolt, if you are one of those who think business offices are getting lax. If you feel need of more information on job analysis, job evaluation, or job specifications, there are two first-rate chapters right from the firing line of business and education,

chapters that are good for the teacher, the administrator, and the counselor.

METHODS • *Appraising Business Education* is written mostly from the teacher's point of view. Part III, however, seems to be specially and pointedly written for the teacher. It confirms that the teacher is The Factor in attaining objectives—his responsibility; his methods, The Methods. Throughout Part III the point is made again and again that the teacher must, after re-evaluating his objectives, also re-evaluate and modernize his methods. From page 146:

A teacher, using the same material and the same methods year in and year out to attain her objectives, regardless of the pupils, the changing situation, or a changing community situation, is presuming to teach in a vacuum!

Have you ever said to yourself, when assigned a new subject to teach, "Well, I'll put in some time on this course this year, organize my lesson plans, keep my materials—and then I won't have to bother again for a few years"? Well, expect another jolt and plenty of help in Part III. There are chapters on flexibility of meeting objectives, correlation of subjects, teaching devices, pupil activities, work experience, extra-classroom activities, your own activities as teacher and supervisor. There is a whole new crop of suggestions; if used, they'll help you face the next report-card day with much more confidence in the accuracy and fairness of your ratings.

CONGRATULATIONS • The persons who evolved *Appraising Business Education* are to be congratulated on making a superior contribution to business education—Robert Finch, the Editor; Benjamin Haynes and Carroll A. Nolan, the Associate Editors; the thirty-three contributors; and the officers of the ECTA and the NBTA. Their yearbook is well-planned, practical and down-to-earth, thorough, useful, authoritative. If you give the book the careful reading it merits, you will be impressed with the material and ideas with which it teems. This yearbook is, as it should be, one of the outstanding books for business educators published this year. Read it closely. Study it. You will receive—as we said at the beginning of this review—an up-to-date course in current business education. Tuition cost: your annual dues.

Note: Although the book costs \$2.50 at the New York University Bookstore, it may be obtained free by teachers who send in their \$2 for a membership in either the Eastern Commercial Teachers Association or the National Business Teachers Association.—*Editor*

YOUR PROFESSIONAL EXAM (Based Upon the 1946 ABE Yearbook)

Question	Page Reference
1. What vocational objective is predominant in the minds of high school pupils?	9
2. What four areas should be included in a formula for vocational competency?	28
3. What are the essentials of basic business competency?	56- 57
4. How would you evaluate pre-vocational objectives?	78- 82
5. Name five recent trends in business offices.	91
6. What are the methods of job analysis?	96
7. What is job evaluation?	114
8. Name some testing procedures in basic business education.	130-137
9. Name six guiding principles the teacher should consider in planning his work.	146-147
10. Upon what does an effective correlation of business subjects depend?	173
11. What is a teaching device?	183
12. In the organization of pupil activities, what factors must be kept in mind?	199-201
13. What is the difference between work experience and co-operative work experience?	220-224
14. What types of pupil activities may be used in basic business education?	244
15. What is the FBLA? Junior Achievement?	284;290
16. What is the "Denver Plan"?	302
17. What are the characteristics of good pupil evaluation?	308-309
18. What principles should be observed in developing a course of study?	324-333

—*Thendore Woodward*

The BUSINESS EDUCATION WORLD

PROFESSIONAL SERVICES

Want Ads as Teaching Aids

THE WANT ADS • Every teacher knows that newspapers and magazines offer in their features and illustrations a refreshing stream of up-to-date lesson aids. Business teachers and guidance personnel are alert particularly to the gems that occasionally appear in the want-ad columns.

At least once a month business teachers should analyze these columns in a metropolitan newspaper. An hour's close study can give the teachers dollar-and-cents statistics about salary rates, salary trends, job opportunities, and skill values, which they can relay to their students to stimulate their work. These same columns also contain valuable source material for focalizing practice in writing application letters, for learning to read the jargon of want-ads, for inspiring discussions about skill training.

This type of information was recently revealed in adjacent columns in the *New York Herald Tribune*. The two clippings are reprinted here for your classroom use and to illustrate this discussion.

WHAT TO DO • First, duplicate copies of the two clippings (permission is hereby granted) and distribute them to your students. Then, depending on whether you wish to use the material as a basis for a home-room or guidance program, for a business-English project, or for a discussion in a stenography or bookkeeping class, try some of these related activities:

☐ Discuss the value of each of the skills and traits desired by the advertiser in clipping 1. Why does he mention "rapid tempo"? What must have been his previous experience with his secretaries?

☐ Determine the value of shorthand skill by comparing the salaries of secretaries and stenographers with the salaries of typists in clipping 2.

☐ List the combinations (example: bookkeeper with knowledge of typing) and describe the nature of the job that is vacant. Is the combination unusual?

☐ Discuss your school's offerings that contribute the training needed for each kind of job. Lead

ARE YOU THIS SECRETARY?

She likes the idea of being secretary to the top executive of a young, well-established, but growing organization because she will play a major part in its accomplishments. With past experience as secretary to a responsible executive of an advertising, publicity, publishing or campaign organization, she understands, can take and enjoy rapid tempo of this kind of work. She is a good technician, rapid shorthand and transcription, can transcribe dictaphone records when her assistant is overloaded, has a good vocabulary, is accurate, good memory of names, people, events—mistress of, not mastered by, mechanics of her job. She is level-headed, does not burst into tears when her chief says, "Next time we might do it a better way." She knows how to save time and energy of a busy executive by organizing procedure, giving intelligent, authoritative answers in his behalf, yet does not antagonize others in organization. Most of all she wants to understand the "why" of everything, yet often waits for an appropriate time to inquire. Age 30 to 40, presentable, neat and gracious. Wants adequate salary to start but has confidence in herself and her executive that she can and will earn more. She can be available without long delay. If you are this secretary, write at once, giving full qualifications, limitations, minimum salary sought, to R 29 *Herald Tribune*.

the discussion to the question, "Should our training be stiffer, our standards higher?" On the basis of how much the worker would earn in five years at the advertised rate of pay, what is the dollar-and-cents value of the pertinent school course? Break this down into the value of each lesson—especially, of each absence!

☐ Discuss the difference between secretarial and stenographic work. Start with the remunerative difference (ascertainable in the second clipping) and develop the difference in requirements, responsibility, and maturity.

☐ Have students "translate" the condensed job descriptions in clipping 2. "Dntn," for example, is *downtown*; and "5d" is *five days a week*.

☐ Have students construct a table that shows

Help Women—Agencies SMITH AND JONES EMPLOYMENT SERVICE

STENOGRAPHERS

SECTY Exec. asst 26/33 5 day	\$60
LEGAL Secty legal, midtn, to 35	\$60
EXEC Secty, college resume 30/38 ..	\$60
SECTY Fr.-Eng. dictation mdtn	\$55
STENOS (5) Spanish-English 5d....	\$50-55
STENO Res. buying firm, 5 day	\$50
SECTY Span Eng Emp St. bldg, 5d ..	\$50
STENO knol Bkping, 5 day.....	\$50
SECTY Publish bkgd, to 30, 5 day ..	\$50
SECTY stat type small, CPA firm ...	\$45
SECTY export dntn 5 day	\$45
SECTY comm bkgd learn legal	\$45
SECTY Advtg & research 5 day	\$45
SECTY Export bkgd Oil Co. 5d	\$45
SECTY, small firm, midtown, 5d	\$45
EXEC Secty, large firm, yng, 5d	\$45
SECTY, Personnel, lrge org. yg. 5d ..	\$45
STENO kn Bkping sales off, 5d	\$40
STENO, 1-2 yrs exp nr Penn sta.	\$40
SECTY to Publicity director, 4d	\$40
SECTY steno, 9:30-5, 5 day, yng.	\$40
STENO, Cosmetic, 5 day, young	\$40
JR SECTYS (4) Airline mdtn, 5d	\$37
STENOS (15) publ. & advtg, 5d	\$35
STENOS (15) genl off midtn-dntn ...	\$35
RECEPT-STENO, young, 5d	\$35
STENO-CLERKS (12), no exp	\$30
JR. Stenos, publ. advtg, com'l	\$25-30

TYPISTS

TYPIST-CLERKS, kno. Steno, 5d ...	\$40
TYPIST, knol languages, downtn	\$38
TYPIST, supv mess'g's 30-35 5d ..	\$38
TYPIST Biller, some exp. 5 day	\$36
TYPIST-Clerk, Export, 35 hr.	\$35
TYPISTS (10), mdtn & dntn, 5d	\$35
TYPIST-Clk, personnel dntn, 5d	\$32
TYPIST-Clk. advg & publicity	\$28
TYPIST-CLK. publ. fee paid, 5d	\$25

BOOKKEEPERS

BKKPR, F. C. factory payroll, 5d ...	\$55
BKKPR, F. C. Real Est. Jamaica	\$50
BKKPR, F. C., kno type sm off 5d ...	\$45
BKKPR ASST. Typist, gd bkgd	\$45
BKKPR Asst little exp, Bklyn, 5d ...	\$40
BKKPR ASST, Typist, young, 5d	\$40
BKKPR, Asst publishing mdtn	\$40

the variations of salary for each kind of job. Then have them parallel that table with a list of skill requirements. For example, a \$50 secretarial position may require a 30-word-a-minute transcription rate, while a \$35 stenographic job may require only a 15-word-a-minute rate. Naturally this discussion points to the questions, "What rate are you worth?" and "What rate do you expect to be worth?"

□ If you wish to stimulate your students so that they are eager to try professional-standard tests, such as those offered in transcription and bookkeeping by this magazine, start a discussion of standards and lead to the question, "Would you like to see how well you would fare according to the standards of business?" (The current tran-

scription and bookkeeping tests for certification or for your own measurement purposes are on following pages.)

RESULTS • Because you can prove that you know the answers when you use these clippings in your class, your students will have renewed faith in you; they will be stimulated to new efforts toward higher achievement; they will consider job relationships with new understanding; and they will become increasingly vocational- and work-minded.—*Alan Lloyd.*

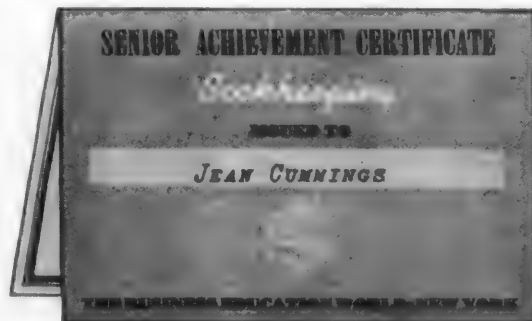
Awards

SEPTEMBER WINNERS • Vada Wright, of Kansas, and Rollande Pepin, of Quebec, have been awarded first and second place in the **BUSINESS EDUCATION WORLD's** first international bookkeeping contest of this school year. Both Miss Wright and Mr. Pepin have been issued certificates and cash prizes to indicate their outstanding achievement: their work was the best in the 3,000 solutions of the September bookkeeping problem.

Miss Wright is a student of Community High School, in Scott City, Kansas, and Miss Hester J. McKee is her instructor. The Canadian second-place winner, Mr. Pepin, attends St. Patrick High School in Trois-Rivières, Quebec, and Sister S. Paul-du-Sacre-Coeur is his teacher.

In addition to these prize winners, fifty-three other contestants have been awarded "honorable mention." Scholastic Achievement Certificates, newly designed and suitable for framing, have been mailed to them. We regret that space limitations prevent our listing all their names.

Prize-winners in the October contest will probably be named in next month's B.E.W. and will include four winners: a first- and second-place winner in both the junior and senior divisions.



"Nothing succeeds like success."

Bookkeeping—December Awards Problem

MOTIVATION • Awards programs, such as those offered by the **BUSINESS EDUCATION WORLD**, are designed to provide a service to the teacher through the stimulation of student interest in the subject and the improvement of student working habits.

"I have worked out each of your projects this term. They were very interesting and I can truly say that I have enjoyed them very much."
—*Neva Pittman.*

NEW PROBLEM • Here is the fourth problem in the 1946-1947 series of contests, designed to stimulate interest in all bookkeeping classes. Solution of this contest problem will require not more than one or two class periods and will provide a welcome change from textbook routine. The problem may be assigned for homework, for extra credit, or for a club activity.

An impartial board of examiners in New York City will grade all papers submitted in this contest, and a two-color Certificate of Achievement will be sent to every student who submits a satisfactory paper. In addition, the **BUSINESS EDUCATION WORLD** will distribute cash prizes for the best student solutions of this contest problem. All information necessary for participation in the contest is given here.

CHEERFUL BUSINESS! • Here is the December contest problem: (*Please read the following introductory paragraphs to your bookkeeping students:*)

In this contest problem, assume that you are employed as part-time bookkeeper for the Cheeryway Card Company. John Merry, the proprietor, has hired you to work after school hours and on Saturdays. You will be called upon to do any one, or all, of the first three steps in the bookkeeping cycle: journalize, post, and prepare a trial balance.

The Cheeryway Card Company specializes in the distribution of holiday greeting cards and gift wrapping papers, party decorations, and personal stationery. Just now, close to the Christmas season, the office and salesroom of this business are bustling with activity. Goods are being received in large wholesale quantities, as purchased from manufacturers, and sold to retail stores or clubs organized to sell Christmas cards and wrapping.

Following is a list of transactions that occurred recently in this business, and this month's problem concerns the recording of these trans-

MILTON BRIGGS, Editor

actions. After the list there are some account titles suggested for your use.

Dictate the following transactions to your students or have the transactions duplicated or written on the blackboard:

DECEMBER, 1946

- 2 Received the purchase invoice for a shipment of cards from the Dickenson Supply Company, New York City, \$405.40, terms on account 30 days.
- 4 Purchased an odd lot of cards for cash from the Everyday Greeting Card Company, \$75.
- 6 Sold cards on account to the Newman Church Service League, \$50. Sale No. 1005D.
- 9 Cash sales to date totaled \$1,045.65.
- 11 Newman Church Service League returned several boxes of cards damaged in transit. Credited their account, \$1.25. (Debit Sales.)
- 12 Sent the Dickenson Supply Company a check for \$200 in part payment of amount due them.
- 14 Bought wrapping paper and string on account from the Superior Paper Company, \$27.50. (Debit Supplies.)
- 16 Sold stationery, on account 30 days, to Harry S. Ryder, \$45.90. Sale No. 1167D.
- 18 Paid cash for printing of advertising circulars, \$34.75.
- 20 Sent the Superior Paper Company a check for \$27.50.
- 23 Sent the Haskins Realty Agency a check in payment for rent of office and salesroom, \$100.
- 26 Received a check, \$25, from Harry S. Ryder in part payment of his account.
- 28 A cash customer returned merchandise. Refunded the sale price, \$3.40. (Debit Sales.)
- 30 Bought a new counter for the salesroom from the Star Equipment Corporation on account, \$125.
- 31 Returned merchandise to the Dickenson Supply Company, \$8.95. Credit was allowed. (Credit Purchases.)

SUGGESTION • The following account titles are suggested for use in preparing the solution for this contest problem: Cash, Accounts Receivable (or individual accounts with customers), Supplies, Equipment, Accounts Payable

(or individual accounts with creditors), Sales, Purchases, Rent Expense, Advertising Expense.

DIRECTIONS • Use pen and ink and your best penmanship in each assignment.

ASSIGNMENT A. For a Junior Certificate: Make entries in simple General Journal form. Use both sides of regular bookkeeping paper, or plain white paper properly ruled.

ASSIGNMENT B. For a Senior Certificate: Do Assignment A; then post all entries to a General Ledger. Use both sides of your ledger paper and all available space. Number each account, and be sure to fill in posting references. Send only your ledger to New York; you need not send your journal.

ASSIGNMENT C. For a Superior Certificate: Do both Assignments A and B; then prepare a Trial Balance on journal paper, or on plain white paper properly ruled. Send only your Trial Balance to New York; you need not send your journal or ledger.

Closing Date JANUARY 13

CONTEST RULES • Before beginning the contest in their classes, teachers should read the following rules carefully:

1. Have your students work the bookkeeping award problem given in this issue. The B.E.W. hereby grants you permission to duplicate the problem for free distribution to your students if you wish them to have individual copies. The problem is so short, however, that it can be dictated or written on the blackboard.

2. Send all solutions by first-class mail or by express to B.E.W. Department of Awards, 270 Madison Avenue, New York 16, New York.

3. With your papers, send a typed list *in duplicate* of the names of the students whose papers are submitted. Place "A" after each name to be awarded a Junior Certificate of Achievement, "B" for a Senior Certificate, and "C" for a Superior Certificate. Certificates must be earned in order.

4. Remit 10 cents for each paper. This fee covers in part the cost of examination, printing, and mailing. The B.E.W. will award an attractive two-color Certificate of Achievement to each student whose solution meets an acceptable standard.

5. Select the three papers that you consider the best, and place these on top of the papers you send in. They will be considered for the award of prizes. (Teachers who do not wish to submit papers for certification may enter in the contest, free of charge, the three best solu-

tions from each class.) Not less than five solutions may be submitted for certification.

6. The B.E.W. will award cash prizes as follows: \$3 first prize for the best solution and \$2 second prize, in each division. To each student who submits an outstanding paper meriting Honorable Mention, the B.E.W. will send a specially designed 8½- by 11-inch Scholastic Achievement Certificate suitable for framing.

7. Each paper submitted must have these data in the upper right-hand corner: student's name in full, name of school, address of school, teacher's name in full.

8. All acceptable papers become the property of the BUSINESS EDUCATION WORLD. Papers not meeting certification standards will be returned with errors indicated.

9. The judges will be Alan Lloyd, Milton Briggs, and Mrs. Claudia Garvey.

10. **CLOSING DATE** of the contest is January 13, 1947. Contest papers to be considered for prizes must be postmarked not later than midnight of that date. Papers postmarked later than that date will be accepted for certification only. Prize winners will be announced in a later issue of the B.E.W., and prizes will be mailed as soon as possible after the judges have decided upon the prize winners.

NEXT MONTH • THE MERCURY MOTOR TRANSPORT COMPANY seeks the services of all student bookkeepers in next month's contest. Your students will be called upon to prepare a trial balance, a simple statement of income and expenses, and a balance sheet for a service business. The January contest problem will be divided into three parts covering these three fundamental steps in bookkeeping procedure. Three different Certificates of Achievement will be awarded, one for each part of the problem satisfactorily solved. There will be cash prizes for the students who submit the best solutions, and a specially designed Scholastic Achievement Certificate for every student who submits an outstanding paper meriting honorable mention.



Milton Briggs, associate editor of the B.E.W. in charge of the bookkeeping awards program, has prepared the problems ever since the program began years and years ago. He is a faculty member of the New Bedford (Massachusetts) High School—hence the practicability of his contest materials for classroom use: he uses them himself!

Transcription—December Awards Program

THIS MONTH • The B.E.W. is giving you three sets of dictation material, all handily word-counted for 15-second intervals, ready for you to use with your transcription students. The first take, 240 words to be dictated at 80 words a minute, can earn a Junior Certificate of Achievement for those of your students who transcribe it mailably at not less than 10 words a minute.

The second take, 400 words to be dictated at 100 words a minute, can earn a Senior Certificate of Achievement for those students who transcribe it mailably at not less than 15 words a minute.

The third take, 400 words to be dictated at 120 words a minute, can earn a hard-to-get Superior Certificate of Achievement for those top-notch students who can transcribe it mailably at 20 words a minute or faster.

You can give these tests to your students and send them to us for evaluation at any time during the school year, provided that when you *do* give these tests, they are given as new-matter dictation.

THE RED TAPE • In the course of conducting the Transcription Awards program for the past five years, certain rules have had to be established, and they apply to this month's and every month's test material. Please do not consider them as red tape; rather, consider them as guides to help your students. Please refer to page 176 in our November issue for the complete contest rules.

THE JUNIOR TEST • To qualify your students for the Junior Certificate, first dictate or write on the blackboard the following names and addresses for addressees of the two letters in this test:

1. Mr. Clyde Nelson, Nelson & Son, Manly, Iowa.
2. Peters & Baldwin, 19 Worth Street, Rockford, Illinois.

Next, dictate the test material given below at 80 words a minute. The letters are counted in 15-second dictation units of 20 words each. When the take is completed, have the students begin transcription at once without any help or suggestions. Those who complete mailable transcripts within 24 minutes (rate: 10 words a minute) are eligible for certification.

Letter No. 1. Dear Mr. Nelson: After forty years of service to your community, you richly deserve the peace and / contentment that retirement will bring.

CLAUDIA GARVEY, Editor

While we shall greatly miss personal contact with you, we are happy to learn that / your son is taking over management of the business. We shall hope to serve him as we have served you in the past / and assure you that we stand ready to assist him in any way we can.

A small gift is being sent you today (1) in appreciation of our pleasant association.

We hope you will find renewed health during your stay / in Florida.

If you should be in this city at any time, won't you come in and say hello? Sincerely yours, /

Letter No. 2. Gentlemen: In closing our accounting records for this year, we have noted with much satisfaction the greatly / increased business you have given us in recent months.

We are appreciative also of the promptness with which you (2) have made payments on your account.

It gives us considerable pleasure to tell you that we are happy to / include you in our list of preferred customers, and we assure you that we shall always be at your service.

Our best / wishes are extended for a happy holiday season and all good fortune in the New Year. Cordially yours, (240 standard words, including addresses)

THE SENIOR TEST • As you would expect, the senior test is more difficult. First, dictate or write on the blackboard the following names and addresses for the three letters in this test:

1. The Trading Post, 10 Cody Street, Muncie, Indiana.
2. Brown & Baxter, 4 State Street, Chicago 2, Illinois.
3. Cole's Department Store, Third and Main, Hammond, Indiana.

Next, dictate at 100 words a minute the test material given below. The letters are counted in 15-second dictation units of 25 words each. As soon as dictation is completed, start timing the transcription. Those students who complete mailable transcripts within 27 minutes (rate: 15 words a minute) or less are eligible for certification.

Letter No. 1. Gentlemen: Your attention is called to our billing terms that allow a 2 per cent cash discount if payment is made within ten days. While we / are glad to have our cus-

tomers take advantage of this discount, we must require that the terms be complied with.

We find that your company has / taken the discount regularly, but that several checks were received some time after the period indicated.

Today we received / a check in payment of our invoice of November 20. To be eligible for the discount your check should have been mailed on or before (1) November 30. We are therefore billing you for the amount deducted. Cordially yours,

Letter No. 2. Gentlemen: We are glad to give you a / report on our dealings with the Smith Department Store, Canton, Ohio, in response to your request for credit information.

We have been / doing business with them for something more than five years and have been entirely satisfied in all our dealings with them.

Their yearly purchases / average \$5,000, and they have kept well within the terms of our agreement that limits their credit balance to \$500. (2)

During the past few months we have noted a good increase in their purchases, indicating increased business. Apparently their financial / standing has also improved because they are now regularly taking advantage of the discount we allow for prompt payment.

From past / experience, we know you will be glad to add this firm to your list of preferred customers. Very truly yours,

Letter No. 3. Gentlemen: We are happy / indeed to add your name to our list of customers. The references supplied with your first order have given us favorable reports (3) on your credit standing. All the items listed in your order of December 2 were therefore shipped on open account.

You did not indicate / method of shipment. Because of the delay resulting from checking the credit references, we sent this first shipment by prepaid express. / We shall require instructions on future orders, so we may follow your wishes in this respect. Yours truly, (400 standard words, including addresses)

THE SUPERIOR TEST • The test for the Superior Certificate is quite difficult and will challenge the best work of the best students. As in the slower tests, first dictate or write on the blackboard the following names and addresses for addressees of the three letters in this test:

1. Mr. George Potter, 6 Peach Drive, Hillsboro, Illinois.
2. Mr. William Smith, 12 Front Street, Eddyville, Iowa.

3. Specialty Shop, 3 First Avenue, Pekin, Illinois.

Next, dictate the test material given below at 120 words a minute. The letters are counted in 15-second dictation units of 30 words each. When the take is completed, start timing the transcription. To qualify for certificates, students must make mailable transcripts within 20 minutes (rate: 20 words a minute) or less.

Letter No. 1. Dear Mr. Potter: Thank you for your check for \$296.

Apparently this check was sent in payment of merchandise ordered during November. Our / records, however, show one bill outstanding. We are enclosing a complete statement of your account. You will note that the check received covers all items except our bill / of November 12. On that day you were charged for goods shipped on your order No. 209.

As your check covered subsequent bills, we are calling this matter to your / attention so that if your records do not agree with ours a satisfactory adjustment can be made immediately. Cordially yours,

Letter No. 2. Dear Mr. Smith: We will (1) soon close our books for the current year, and we find that we have a great many small accounts outstanding. Most of these are so insignificant that we feel sure they were / overlooked.

The total comes to well over \$1,000, however, and you can appreciate that this is a most significant amount.

Won't you please give prompt / attention to the enclosed statement of your account?

Our best wishes are extended to you for a happy holiday season. Cordially yours,

Letter No. 3. Gentlemen: According to / the terms of our agreement, we were to extend credit to your company up to \$1,000. While you have not yet reached your maximum, we find that an order (2) just received increases the amount due us to almost \$800, and that your previous balance of \$500 has been on our books for almost six months. In that time we have not received any orders nor have we received any payment on account. Although your company has not reached the full amount of credit agreed / upon, we believe that the inactivity of your dealings with us is indicative of a slump in your trade. We therefore hesitate to fill the current / order without assurance from you regarding your financial status.

If you will let us have a sworn statement regarding the present financial worth of your company, (3) we shall reconsider this matter. Very truly yours, (400 standard words, including addresses)

Part Four of a Story Begun in September

From "Alexander Botts, Earthworm Tractors"

WILLIAM HAZLETT UPSON

(Copyright, 1928, Curtis Publishing Company)



I HAD DECIDED to dump my⁵⁰⁴⁰ passengers at the factory, where they could telephone for a taxi to take them to town, and I was then going⁵⁰⁵⁰ to turn right around and head for the Seaside Inn, which I was certain I could reach before the tide came in again.⁵⁰⁶⁰

But about a hundred yards from shore we ran into a patch of mud which was much softer than the sand. The tractor⁵¹⁰⁰ stayed on top very well, but the wagon began to sink in so deep that I was afraid it would be completely⁵¹³⁰ stuck.

"Whoa!" I said to Andy. "I think we had better unhook the tractor, drive it around and hook onto the⁵¹⁴⁰ rear so we can pull the wagon backward out of this mud. As soon as we get the wagon onto the firm sand we⁵¹⁶⁰ can hook on in front again and circle around this soft spot."

"All right," said Andy. "It's a good idea."⁵¹⁸⁰

Unfortunately it was not a good idea. We had no trouble hooking onto the rear of the wagon, but as⁵²⁰⁰ we pulled it backwards we must have backed the nut off the end of one of the axles. When we were just about halfway⁵²²⁰ out of the mud hole the left hind wheel came off, the left hind corner of the wagon dropped down, and the four ladies, the⁵²⁴⁰ gentleman from New York, the four trunks, the eighteen suitcases, the road plow, the nail kegs, the dog, and the canary⁵²⁶⁰ bird all slid off gently but firmly into the mud. It certainly was lucky that Andy, Mabel, and I happened⁵²⁸⁰ to be on the seat of the tractor.

For some reason or other the four aunts seemed to blame me for this accident,⁵³⁰⁰ although it was nothing that I could have foreseen or prevented and was obviously due to faulty design⁵³²⁰ in the wagon. They shook their umbrellas at me and told me exactly what they thought of me—which apparently⁵³⁴⁰ was not much. After what they said it would have served them right if I had let them waddle ashore through all the mud.⁵³⁶⁰ But I am naturally chivalrous and kind-hearted, so I had Andy make several trips with the tractor⁵³⁸⁰ and carry them and their belongings over to the canning factory.

You might have supposed that this kind treatment⁵⁴⁰⁰ on my part would have earned their gratitude. But such was not the case. They all trooped into the factory—which was not⁵⁴²⁰ locked, although the workmen had not yet appeared—and one of them called Mr. Hubbard on the telephone. She told Mr.⁵⁴⁴⁰ Hubbard to come out and get them at once, and she said that they had been thrown in the mud, insulted, kidnapped, and⁵⁴⁶⁰ half

drowned by a crazy tractor salesman. After the telephoning was over they all stood around and glared at⁵⁴⁸⁰ me—that is, all but the gentleman from New York, who was too timid, and his niece, who was too sensible. As there⁵⁵⁰⁰ didn't seem to be much I could do for these people, and as some of them did not seem to be enjoying my⁵⁵²⁰ company, I withdrew and went out with Andy to work over the wagon. After hunting around a while we were⁵⁵⁴⁰ fortunate enough to find the nut which had come off the axle.

"If we were on a hard road," said Andy, "and if⁵⁵⁶⁰ we had a good jack, we could lift up this axle and put the wheel back very easy. But, as it is, I'm afraid⁵⁵⁸⁰ we'll have to take off the whole load of lumber."

"I'm afraid you're right," I said.

Pretty soon we saw Mr. Hubbard driving⁵⁶⁰⁰ up to the canning factory. He had come in a hurry. At once the four excited females gathered around⁵⁶²⁰ him, talking fast and furious, and apparently giving him their version of what had happened. They must have⁵⁶⁴⁰ poured him out a good earful, because very shortly we saw him coming across the sand like a cavalry charge.⁵⁶⁶⁰ Andy and I walked forward to meet him and he was positively foaming at the mouth.

"What do you mean by pulling⁵⁶⁸⁰ off such a stunt?" he said. "You told me you were going to haul a load of lumber over to the Seaside Inn.⁵⁷⁰⁰ Instead of which you kidnap a lot of my guests. You take them out into the middle of the bay. You pretty near⁵⁷²⁰ drown them. You scare them half to death. Then you wreck my wagon and dump them all into the mud. It's an outrage."

"But, Mr.⁵⁷⁴⁰ Hubbard," I said, "you don't understand. I can explain everything."

"I don't want to hear another word,"⁵⁷⁶⁰ interrupted Mr. Hubbard, "and I don't want any explanations. I don't want anything more to do with you.⁵⁷⁸⁰ I wouldn't take your tractor as a gift. The best thing you can do is get out of town as fast as you can. If you⁵⁸⁰⁰ ever even speak to me again I'll knock your block off."

And before I could answer he turned around and went back⁵⁸²⁰ to his automobile. The party from New York all piled in. I heard Mr. Hubbard tell them he would send back a⁵⁸⁴⁰ truck for their trunks and suitcases. Then they drove off toward Hubbardston.

Andy and I sat down on the shore to consider⁵⁸⁶⁰ the situation.

I WILL have to admit that I was not completely satisfied with the way things had been⁵⁹⁰⁰ going. Of course I was not to blame for the treachery of Captain Dobbs, nor for the unfortunate loss of the⁵⁹²⁰ wheel from the lumber wagon. But I realized, nevertheless, that I was to a certain extent in wrong with⁵⁹⁴⁰ Mr. Hubbard. I knew that if I was to sell him a tractor I would have to overcome a certain amount⁵⁹⁶⁰ of sales resistance. And I decided that the only thing to do was to take that load of lumber across to⁵⁹⁸⁰ the Seaside Inn as soon as possible. This would give me a talking point with which I could once more approach my prospect⁶⁰⁰⁰.

"Andy," I said, "if we are able to get this

and Good Reading

wagon repaired, are you willing to try another trip?"

"Sure,"¹¹⁶⁰⁰⁰ said Andy.

By this time it was almost seven o'clock and the workmen had begun to arrive at the canning⁹⁰²⁰ factory. The boss of the clam diggers was very much interested in the tractor, and asked me what sort of⁸⁵⁰¹⁰ a trip we had had. I had to admit that it was not so good.

"We saw you starting out last night," he said. "We yelled⁶⁰⁶⁰ at you to tell you the tide would soon be in. When you paid no attention, we decided you probably knew what⁶⁰⁰⁰ you were doing. We decided your machine was probably fast enough to get you across ahead of the tide."⁶¹⁰⁸

"It wasn't," I said. "Would it be possible," I went on, "for me to hire some of your clam diggers to help unload⁶¹²⁰ that lumber, put the wheel back, then reload the wagon?"

"I'm afraid not," he said. "We only have about an hour before⁶¹³⁰ the tide comes in, and I will have to keep all hands busy to get out enough clams to keep the factory going⁶¹⁰⁰ until this afternoon."

"Maybe," I said, "we could speed up the clam digging a little with our tractor."

"You could⁶¹³⁰ try," said the boss clam digger.

"Come, Andy," I said. "Let's see what we can do."

We ran the tractor out to the disabled⁶²⁰⁰ wagon, and hitched onto the big road plow. Then we drove back and forth across the mud flats, plowing big deep furrows,⁶²³⁰ and in about ten minutes we had turned out more clams—according to what the boss clam digger told us—than twenty⁶²⁴⁰ men could dig in a whole morning.

The boss clam digger was very much pleased and he let us have a dozen men to⁶²⁶⁰ unload the lumber, put on the wheel, and reload the lumber. Meanwhile, three men with baskets picked up the clams.

When the⁶²⁸⁰ tide began to come in, a little after eight o'clock, we had our lumber loaded and the wagon and tractor⁶³⁰⁰ parked beside the canning factory all ready to go. And the canning factory had about three times as many⁶²⁹⁰ clams as they could have dug in the same length of time by hand. It was a very satisfactory arrangement⁶²⁴⁰ all around.

The boss clam digger told me that the tide would go out again at about four in the afternoon and⁶³⁶⁰ that the sand flats would be free from water from then until about eight. As I felt that this information was⁶³⁰⁰ reliable I decided to start out for the Seaside Inn at four o'clock. In the meantime I have been sitting⁶⁴⁰⁰ around the office of the canning factory writing this report, and eating great quantities of excellent⁶⁴²⁰ steamed clams which the boss clam digger was kind enough to offer me.

It is now noon, and the tide is almost at its⁶⁴¹⁰ highest point. But before long it will be running out, and as soon as its gets off the flats we will be on our way.⁶⁴⁶⁰ The boss clam digger will mail this report when he goes home to Hubbardston this evening. And tomorrow I expect⁶⁴⁰⁰ to send you another report stating that I have successfully demonstrated that it is possible to⁶⁵⁰⁰ haul freight across Sandy Inlet. I also hope that either to-

THE GREGG WRITER KEY

The dictation materials on these and the following pages are shown in shorthand in this month's issue of THE GREGG WRITER. The key given in the B.E.W. is counted in units of 20 standard words.

FICTION

B.E.W. Page	G.W. Page
238Sandy Inlet (Part IV).....	215
239Wits and Wags.....	224

ARTICLES

240Up To Date With Jet Propulsion	201
242Pick Out Your Cave.....	213
242Distorted Speech	221
243Radio Telephones for Taxicabs	222
246Education Pays Off.....	220

OTHER MATERIAL

243... ..Graded Letters for Chapters 10, 11, and 12 of the Gregg Manual	210
243O.G.A. Test Material.....	185, 198
244Transcription Speed Practice..	192
246Actual Business Letters.....	223

morrow or some time within the next few days I⁶²⁰ may be able to get hold of Mr. Hubbard and talk him around into a reasonable frame of mind. Very⁶⁵⁰ truly yours, ALEXANDER BOTTS. (6546)

(To be concluded next month)

By Wits and Wags

JONES: Where's the stationery, please?

Clerk: Are you a guest of this hotel?

Jones: Certainly not—I'm paying \$10 a day.

AT CHRISTMAS TIME every girl wants her past forgotten and her present remembered.

"HOW did Santa Claus treat you?"

"He brought me this lovely woolen sweater."

"That isn't wool. It's plainly marked 'cotton.'"

"Yes, I know—that's to fool the moths."

DURING THE WAR my brother stayed home and worked on the farm instead. One day while he was milking a cow a soldier came along and said, "You slacker! Why aren't you at the front?"

And my brother said, "Because there isn't any milk at that end."

MAN: Hey, that wasn't the tooth I wanted pulled!

Dentist: Calm yourself, I'm coming to it!

BROWN: Can you keep a secret?

Green: Sure.

Brown: I need to borrow some money.

Green: Don't worry. It's just as if I never heard it.

ARCHITECT: Have you any suggestions for the study, Mr. Quickrich?

Mr. Quickrich: Only that it must be brown. Great thinkers, I understand, are generally found in a brown study.

Up To Date With Jet Propulsion

THE MEN who build planes and fly them have said of jet propulsion in general: "It is the first big advance in aviation since the beginning" and "It is the entrance into the final phase of man's effort to propel himself through space."

For more than two and a half years the facts of this new means of flight were locked in the tight vault of military secrecy. Even the first announcements gave only the vaguest details. There is a need, now, to tell much more than this. For the research which made jet flight possible also removed the obstacles that had long impeded the development of a new source of motive power—the gas turbine—as a prime mover, not only of planes, but potentially of railroad engines and ships as well.

To come up to date with jet propulsion, therefore, we must review briefly the bright prospects for the gas turbine as well as the brilliant story behind America's first jet-propelled plane.

Towards Jet Flight . . . In the summer of 1941 a number of General Electric engineers were confident that American aviation was on the threshold of a new kind of flight, flight in which streams of gas replaced the propeller, flight by jet propulsion. Already at Lynn, G-E men had held meetings to compare their thinking on jet propulsion, had plotted jet performance curves, had written reports, had studied intently the accounts of advances made in Italy, England, and Germany. Not content with the jet information received from Europe, Dr. Sanford A. Moss and William R. Foote had carefully worked out the mathematics of jet propulsion.

Into this tinder-box of combustible thought the Army Air Forces thrust a spark. On September 4, 1941, at the moment when galley proofs of the article by Dr. Moss and Mr. Foote had arrived in Lynn, General H. H. Arnold summoned a meeting of G-E engineers in his Washington office. He told them he could obtain for them the drawings and an actual engine of a jet plane designed by Group Captain Frank Whittle of the Royal Air Force. Would they undertake the design and development of jet propulsion for the AAF?

G.E. was more completely ready than might have been anticipated. For Whittle's idea was, in simplest terms, to use a gas turbine to provide the gaseous jet. Long a master-builder of steam turbines, G.E. had also carried on experiments in gas turbines that went back as far as 1895. Since 1917, moreover, it had, in the development of the turbosupercharger, been making a practical application of a turbine wheel turned by gas. Drawing upon this backlog of knowledge about gas turbines, centrifugal compressors, turbosuperchargers and hot gas tests, G-E engineers were able not only to complete designs of many different parts of the jet engine before the Whittle engine and drawings had arrived, but also, upon studying the drawings, to suggest a number of important improvements.

After six months of this fruitful cooperation, which included a trip to River Works by Captain Whittle himself, the first jet engine to be built

in the United States successfully passed its tests. And finally, in October, 1942, just a year from the time when the Whittle drawings had arrived in the United States, the P-59 Bell Aircomet — our first jet-propelled airplane — was ready for flight.

The Background . . . What was the significance of the scene that unfolded then on the bed of a dried-up California lake? When our first jet plane took cleanly to the air, what had been achieved?

In the first place, the flight was our first American realization of a dream that went back through the centuries. In ancient Greece, Hero had demonstrated jet propulsion by means of his Aeolipile, a rotating ball operated by jets of steam. Sir Isaac Newton had planned a jet-propelled carriage in 1680 and had formulated the law on which all subsequent experiments were based. In 1849 in England, Charles G. G. Golightly had worked, fruitlessly, on a jet-propelled plane, "a steam horse on which one may ride from Paris to St. Petersburg in one hour."

The simple fact is that if an object—a balloon, a gun, a fire hose—discharges a jet toward the east, the object itself will be thrust toward the west. "Every action," Newton wrote, as his third law of motion, "produces a reaction, which is equal in force and opposite in direction."

The idea was always there, that if somehow you could rig up a vehicle that would expel a steady jet behind you, you would go steadily forward.

In aviation this idea has followed two broad paths. One school of experimenters has planned toward a vehicle which carries both fuel and the oxygen with which to burn it. This is the rocket. The other school has sought to perfect a machine that would carry its fuel, but gain its oxygen from the air.

When we speak of jet propulsion today, we mean this latter type of machine. The jet plane which first rose up over California in 1942, and those which have followed it, can never, however much they are improved, fly to the moon, for they must breathe the atmosphere of the earth.

World War II . . . Yet in the end, jet propulsion was not perfected merely to realize an age-old dream, but to serve as a weapon in modern air warfare.

When World War II started, the finest aircraft possessed by any country were no more than elaborate refinements of the plane by which the Wright brothers left the sands of Kittyhawk in 1903. They contained reciprocating engines, which thrust air past wing surfaces by means of the slanted blades of airscrews.

This conventional airplane might be made larger, might be given more engines, sleeker lines, better fuel. But it could not be expected to fly with much greater speed. Why? The engineer answers with two words: air compressibility. A wing or a propeller blade that slips smoothly through the air at 200 miles per hour may pile up the air in stubborn, tangled, resistant masses at 500. The engineer says that the propeller or wing compresses the air and increases "drag." It is his way of saying that two of the things—the wing and the propeller—which made flight possible in

the Wright's¹²⁴⁰ plane also placed a limitation on the ultimate speed of that flight, a limitation so effective that¹¹⁶⁰ even the most intensive wartime research could bring about only small advances.

Yet an airplane's wings are much¹¹⁸⁰ less susceptible to drag and compressibility than the whirling propeller. In every warring country,¹³⁰⁰ engineers knew that to give their pilots an immediate speed advantage of at least a hundred miles per¹²²⁰ hour, they did not have to change the wing materially—they had only to get rid of the propeller. They had¹²⁴⁰ to fly by jet propulsion.

The idea went back to ancient Greece. The law was formulated in 1680.¹²⁸⁰ Why did it take man so long to make jet propulsion work? The answer becomes apparent in a¹²⁸⁰ description of the device which, for American pilots, first mastered all the problems—the I-16 jet engine.¹³⁰⁰

Producing the Jet . . . Somewhere within the I-16 millions of complacent molecules are converted into minute bullets, each¹²²⁰ one of which is shot out of the engine's rear nozzle. The recoil from these molecular bullets makes the jet plane¹²⁴⁰ move.

The conversion begins in a rotating fan called the impeller or compressor, which sucks in molecules¹³⁰⁰ of air, packs them tight together and forces them backwards through a series of ducts. This compressed air is, of course,¹³⁰⁰ capable of tremendous expansion. So is the fuel with which it is mixed. Thus primed, the molecular gun is¹⁴⁰⁰ fired in the engine's second component, the combustion chamber, and its blast of hot gases is spurted at¹⁴²⁰ terrific velocity out of the exhaust vent.

That is jet propulsion—except for one oversight. How is the¹⁴⁴⁰ compressor to be turned? Experimenters in Italy had tried to use a reciprocating engine and¹⁴⁶⁰ had found themselves with a fuselage so full of machinery that they could hardly find room for the pilot.

In¹⁴⁶⁰ the I-16 the hot hurricane of gases pushing toward the vent is forced to push against the artful blades, or¹⁵⁰⁰ buckets, of a gas turbine, turning them as the wind turns a windmill. The turbine spins a shaft, the shaft turns the¹⁵²⁰ compressor, the compressor sucks in more air, and the gun is loaded again.

This, the most ingenious twist, has been the¹⁵⁴⁰ most difficult to perfect. For only in recent years has the metallurgist provided metals which would stand¹⁵⁶⁰ up in the scorching exhaust. Before the war, when the flight expert raised the combustion temperatures enough to¹⁵⁸⁰ give him power to fly, the turbine blades softened and flew into pieces. And when the metallurgist brought the¹⁶⁰⁰ temperatures down within the range of his metals, the turbines generated too little power for flight.

It was¹⁶²⁰ not, then, merely by chance that General Electric was selected to build this first jet engine. The Army knew¹⁶⁴⁰ that before 1940 G.E. had a backlog of gas-turbine experience going back through¹⁶⁶⁰ forty-five years of experimentation. The Army knew, too, that it had been G.E.'s long championship of the¹⁶⁸⁰ turbosupercharger—the first useful application of the gas turbine—that had paved the way to jet flight.

New Directions . . . At¹⁷⁰⁰ Muroc, California, the Airacomet took off to the height of one foot, again to two feet, to twenty¹⁷²⁰—five feet, and then to a hundred. On October 2, 1942, the test pilot, sure of his plane,¹⁷⁴⁰ lifted it up to 10,000 feet.

Sounding like a hoarse blowtorch the jet plane flew swiftly and well. There was so little¹⁷⁶⁰ vibration in the cockpit that the pilot requested a vibrator be placed in the instrument panel¹⁷⁸⁰ in order that he could be sure the instruments were not stuck.

Impressed, the Army decided that jet engines were¹⁸⁰⁰ needed in volume. G.E. converted to this work at its big plant in Syracuse, where the turbine program for¹⁸²⁰ destroyer escorts had just been completed. Before long the entire plant with its more than 600,000 square¹⁸⁴⁰ feet of floor space was devoted to the making of jet engines.

In the months since the announcement of the Airacomet,¹⁸⁶⁰ in January, 1944, the story of jet propulsion has been one of¹⁸⁸⁰ cooperation with the nation's major aircraft builders. General Electric has perfected the engines; Lockheed,¹⁹⁰⁰ Consolidated, Republic, Ryan have designed the planes. For Lockheed's P-80 Shooting Star, General¹⁹²⁰ Electric built an engine more than twice as powerful as the I-16. The Consolidated XP-81¹⁹⁴⁰ is powered by a gas-turbine engine in the nose and a G-E jet in the tail. Republic's XP-84,¹⁹⁶⁰ still faster, has an improved "axial flow" jet engine. The Navy's Ryan "Fireball," with both a conventional¹⁹⁸⁰ engine and a jet, uses the latter for added bursts of power and speed.

Today many of these engines²⁰⁰⁰ are manufactured for the Government by the Allison and Chevrolet divisions of General Motors,²⁰²⁰ but they are manufactured to G-E designs.

The Gas Turbine . . . As long as it was linked solely with jet propulsion, the gas²⁰⁴⁰ turbine was synonymous with speed. It found use only in bullet-like military planes. It would seemingly²⁰⁶⁰ never raise skyward the casual traveller, the amateur pilot, the average man.

But in October²⁰⁸⁰ of last year General Electric announced a gas-turbine power plant that may become Everyman's engine²¹⁰⁰ in the near future. This was the Propjet engine, whose turbine spins not only an air compressor for jet propulsion²¹²⁰ but also a propeller for conventional flight. The G-E Propjet is the first propeller-drive gas-turbine²¹⁴⁰ in the world.

There were many reasons why the gas turbine should spin a propeller. For example, the turbine²¹⁶⁰-propeller combination removes the ceilings on power that have long hampered plane designers. Reciprocating²¹⁸⁰ engines can reach thirty-five hundred horsepower only with prohibitive complexity, but a gas turbine²²⁰⁰ of ten thousand horsepower is entirely feasible. The small, sleek XP-81, housing both a propjet²²²⁰ and a straight jet engine, has nearly as much power as a Superfortress!

The trend seems clear: when tomorrow's²²⁴⁰ sky-traveller sets out, he will fly by means of gas-turbine power plants, whether in giant commercial airliners²²⁶⁰ or in his own simpler, safer, cheaper, personal plane.

THE PROSPECTS for the gas-turbine do not end here. G.E.²²⁸⁰ has recognized the particular adaptability of the gas-turbine plant to locomotive design²³⁰⁰ and is busily engaged in developing a single gas-turbine unit as the locomotive power²³²⁰ source. For marine applications, too, the turbine is well adapted.

Having helped the gas turbine evolve through²³⁴⁰ the turbosupercharger, the jet propulsion engine, and now the propjet engine, G.E. anticipates the²³⁶⁰ day when this new kind of motive power will be

used whenever high power needs to be coupled with light weight.

A New Flight Test Center . . . In²⁰⁰⁰ Schenectady this past summer, while the country's newest, biggest, and fastest planes paraded overhead, G.E.²⁴⁰⁰ dedicated its Flight Test Center, a combined laboratory and hangar large enough to house its own fleet²¹⁵⁰ of test planes. Here, investigations in jet propulsion have become integral parts of a program which includes²⁴⁴⁰ research in radar applications, turbosuperchargers, aircraft armaments, automatic pilots and control systems.²⁴⁰⁰

The addition of the Flight Test Center to General Electric's laboratory facilities²⁴⁰⁰ insures keeping American aviation ahead in safety, convenience, swiftness, and sureness. (2499) — *An October release from the General Electric Company.*

Pick Out Your Cave

From the "KVP Philosopher"

IN THESE DAYS of critical shortages, the metals in particular, it is easy to "prove" that man will²⁰ eventually, even soon, exhaust Nature's stores and have to revert to the simple life of the Stone Age.

Our oil⁶⁰ will be gone, our forests laid low, our mines worked out, our soil will be washed down to the sea. There is admittedly a⁶⁰ pretty good case for some of these prophets of gloom.

Not long ago we were talking about the lead shortage with the⁶⁰ research head of one of our big ammunition companies. He agreed that the situation was not good. His¹⁰⁰ own industry is dependent upon plentiful supplies of lead, and the battery makers even more so.¹²⁰

"Are there no substitutes?" we asked.

"No. Not, that is, in the accepted sense that they are as good and as cheap. You can¹⁰⁰ make batteries without lead, and you can make ammunition, but they cost far too much. All ballistics of shotgun¹⁰⁰ shells and rifle cartridges, for example, are based on lead. All gun barrels are planned for it. We'd have to start all¹⁰⁰ over if we used anything but lead."

Yet he did not seem greatly disturbed. He knew too much about what is going²⁰⁰ on in research laboratories to lose any sleep.

He knew that all transportation was once designed for²⁰⁰ the power in a man's legs and feet. Then somebody caught a wild horse colt and a baby camel and a cow's calf,²⁴⁰ and transportation started all over in the face of the tribal chief's dictum, "You'll never get me topside of²⁰⁰ one of them critters. They'll never be practical. Walking is good enough for me."

He knew that when, for want of whales,²⁰⁰ New Bedford and Nantucket ships furled their sails, black gold that oozed out of the ground lighted more lamps than whale or olive²⁰⁰ oil has ever kindled. And that long before the prophets of darkness predicted depleted oil reserves, coal and²⁰⁰ water and a Thomas Edison were making sure that light would not fail.

He knew that when the papyrus reeds of²⁰⁰ the Nile were running short, and the skins of animals could not keep pace with the demand, an invention from China²⁰⁰ gave paper to the world and helped bring about the renaissance.

He knew that when old rags got scarce, man

learned a belated²⁰⁰ lesson from the hornet and made paper from wood, as good for most purposes as from rags, and at one-fifth the⁴⁰⁰ cost.

He knew that the sea has yet to give up its wealth of minerals, and the sun its power. That the winds and the⁴²⁰ tides have barely felt a bridle, and only the shell of the atom is harnessed.

The time will come when lead and tin,⁴⁴⁰ iron and silver, and scores of things now thought absolutely essential will either be discovered in new⁴⁰⁰ deposits, will be procured from the air or from the sea, or will be replaced by substitutes that will do the job as⁴⁸⁰ well or better. Even the life-giving soil of Mother Earth may some day yield to better, surer, cheaper ways of⁵⁰⁰ food production.

For the mind of man, which, like his body, must also be made in the image of his Creator,⁴⁰⁰ is still in its chrysalis stage, as far removed from its perfection as a mountain of pitchblende is removed from⁵⁴⁰ its tiny treasure of radium.

Pick out your cave if you want to, whet an edge on your stone axe, practice making²⁰⁰ fire without matches. We're sticking with the boys who have the keys to Nature's still untapped storeroom. What they imagine⁶⁰⁰ they can do, they will do. Theirs is the faith that removes mountains.—G. S. (592)

Distorted Speech

From "The Advertiser's Digest"

YOU are known by your voice mannerisms as well as by other mannerisms, such as your handshake, your stride, or²⁰ your posture. You could be blindfolded and still be able to recognize your friends or your enemies by their voices.⁴⁰

You can develop yours ears to such an extent that you can even know and diagnose people by their voices⁶⁰ alone, recognizing traits of character as well as physical condition, sometimes even identifying⁸⁰ physical ailments by the speaking voice.

For example, acid stomachs usually develop acid¹⁰⁰ voices and acid dispositions—sharp and sour that would almost cause blue litmus paper to turn red.

Gall bladder¹²⁰ and liver subjects have what may be called bitter speech, varying with the stage of the disease from acrid gall¹⁴⁰ to cynical irony. Their presence is often a "bitter pill" to take, principally because of the bitter¹⁶⁰ quality of their speech distortion.

Emotions cause definite directions or distortions of speech quality.¹⁸⁰

The pessimist has a bitter, hard, despondent, gloomy voice, because he tends to exaggerate evil and²⁰⁰ to anticipate misfortune and failure.

The optimist, looking on the bright side of life, takes a hopeful view²²⁰ and usually has an enthusiastic, vibrant voice.

Fear-ridden souls, who are angry, jealous and hateful,²⁴⁰ have the caustic, shrill sort of voice which characterizes a broadcasting Hitler.

Repression, frustration, discouragement,²⁶⁰ and disappointment will call forth a whining, complaining voice.

Severe pain will cause a tight, high, humming effect²⁸⁰ in the voice, all unconsciously.

Sorrow, as from a loss by death, will cause the voice to break.

Sympathy and³⁰⁰ humility of spirit are often acquired through personal experience of pain or through some bereavement, and³²⁰ these qualities

reflect themselves in a voice which may be sympathetic and attractive.

The fact is that you have³⁰⁰ a right to a good voice. Ten to one, your vocal apparatus is all right. The trouble with your voice may be that²⁰⁰ you have distorted it by one or more of the bad habits mentioned, or by any one of dozens of others²⁰⁰ which might be named.

To distort is to twist out of shape. That is what you do to your voice when you misuse it. You owe⁴⁰⁰ it to yourself to correct such unpleasant distortions, and to cultivate a voice quality which, at the very⁴⁰⁰ least, can be heard without unpleasant effects, and which, at the best can be made one of your assets in your quest⁴⁰⁰ for success, in that it pleases, attracts, and wins confidence. (451)

Radio Telephones for Taxicabs

PHILADELPHIA'S Yellow Cab Company recently initiated a series of tests to determine³⁰ the feasibility of two-way radio communication for a fleet of taxicabs. The tests got under⁴⁰ way with the installation of a receiving and transmitting unit on the outskirts of the central district,⁶⁰ and the placing of mobile equipment in one of the company's cabs. This first step is to be followed by⁵⁰ the installation of similar mobile equipment in cars driven by the Yellow Cab's street supervisors¹⁰⁰ and finally in about fifty cabs of the fleet, which will be available for emergencies.

Developed¹²⁰ and designed by RCA Victor Division of Radio Corporation of America, these high¹⁰⁰ frequency radios are rated to cover a radius of about thirty miles. They are designed to eliminate¹⁰⁰ the "blind spots" and "shadows" which frequently interfere with mobile communications in downtown areas¹²⁰ when lower frequencies are used.

The system, when placed in full operation, will establish direct and constant²⁰⁰ communications between the dispatcher's office, in direct contact by telephone with the radio²⁰⁰ station, and individual cabs. A dial system will enable the dispatcher to call any cab. When³⁰⁰ he dials a particular cab's number, a bell will ring in that cab alone. To call the dispatcher the driver³⁰⁰ will have only to push a button and pick up his hand set.—*Nation's Business* (274)

An Exciting Prospect

(Junior O.C.A. Test for December)

Dear Bob:

Indeed I will join you for the holiday.

While we are on this matter of improvement, let me ask you if you have ever tried writing Gregg symbols for the Spanish words? I have reviewed my Spanish grammar and reader, and I am now studying the Gregg Adaptation so that I shall be able to take dictation in it.

Our firm is opening a branch office in Brazil, and I have been told that I shall have the opportunity to go to Brazil if I will brush up on my Spanish. I am studying my old textbooks and I enjoy reading those stories and essays now that there is a purpose for doing so.

I was asked if I knew another young man who would be interested in going to Brazil also. Are you game to make a break and go with me?

Ross

The Great Were Young As You

(O.C.A. Membership Test and Contest Copy)

THE GREAT were once as you.
They whom men magnify today
Once groped and blundered on Life's way,
Were fearful of themselves, and thought
By magic was men's greatness wrought.
They feared to try what they could do;
Yet Fame hath crowned with her success
The self-same gifts that you possess.

The great were young as you,
Dreaming the very dream you hold,
Longing yet fearing to be bold,
Doubting that they themselves possessed
The strength and skill for every test,
Uncertain of the truth they knew,
Not sure that they could stand to Fate
With all the courage of the great.

Then came a day when they
Their first bold venture made.
Scorning to cry for aid,
They dared to stand to fight alone,
Took up the gauntlet Life had thrown,
Charged full-front into the fray,
Mastered their fear of self, and then
Learned that our great men are but men.

—Edgar Guest

Graded Letters for Use with the Gregg Manual

A. E. KLEIN

For Use with Chapter Ten

Dear Mr. McNutt:

I regret to say that we cannot enter into the contract with you for the construction²⁰ of electrical equipment because of several circumstances beyond our control.

In the first place, there⁴⁰ is the matter of the distribution of the electrical equipment. We failed to anticipate a shortage⁶⁰ of trucks, and a survey conducted by the superintendent of our traffic department reveals that it⁶⁰ will be at least a year before adequate transportation can be provided.

In the second place, there is an¹⁰⁰ extreme shortage of good help. You understand, of course, that

in the construction of fine electrical instruments¹²⁰ great precision is demanded, and it is therefore of paramount importance that the workmen possess¹⁰⁰ extraordinary skill and high intelligence. During the War the instruction and training of such help declined, and until¹⁰⁰ this shortage is alleviated to some extent, our production of superior electrical¹⁰⁰ instruments must be limited.

We regret that we must decline your offer, but our superintendent considers³⁰⁰ these restraints too great to be overcome at the present time. Yours very truly, (214)

Dear Mr. McNeil:

Some extraneous material has been interfering

with the superior quality⁷⁰ of our output to such an extent that we have been forced to shut down our central electroplating plant in⁶⁰ Detroit. This extraneous element, which clings to the electrodes of our specially constructed vats, has caused⁸⁰ over \$5,000 worth of damage in a short interval of time.

Because of this extraordinary⁹⁰ circumstance, there remains a great deal of work that must be done as soon as possible. Rather than distribute this¹⁰⁰ work to strange contractors and perhaps multiply our difficulties, we transferred it, including your order, to¹¹⁰ our smaller plant in the second district. Of course you understand this will necessitate postponing the delivery¹²⁰ date two or three days, due to the extra time needed for transportation from our plant in Rome to Detroit.¹³⁰

We sincerely hope that this short delay will not seriously interfere with or interrupt your plans. Very¹⁴⁰ truly yours, (182)

For Use with Chapter Eleven

Dear Sir:

Your proposal that we curtail drastically the production of chemicals because of the current²⁰ political and stock market situations was forwarded to the board of directors last week. The chairman³⁰ of the board, after consulting with authorities on politics and the stock market, informs me that the⁴⁰ radical departure from peak production proposed is entirely unnecessary.

Upon further reflection⁵⁰ it is self-evident that this act would result in the gradual shutdown of several plants, decrease our⁶⁰ efficiency, disrupt our schedules, and injure our reputation. In addition, some of the leading chemical⁷⁰ engineers in this locality have come forward with figures and statistics which indicate that from a⁸⁰ technical standpoint this program would result in the injury and physical deterioration of our fixtures⁹⁰ and machinery.

Naturally our treasurer is opposed to such a program. He disputes the wisdom¹⁰⁰ of the proposal and claims that financially and economically it is fundamentally unsound.¹¹⁰

All authorities are agreed that a less radical and more fundamentally sound solution is required.¹²⁰ The attainment of this requirement is actually the responsibility of the board of management.¹³⁰ Hence, the chairman of the board has called a meeting to be held at 8 p. m., December 16, at the Chamber¹⁴⁰ of Commerce Building. Because of the critical nature of this emergency, he emphatically stated¹⁵⁰ that telegrams of notification be sent to all stockholders and to the general manager and the¹⁶⁰ assistant general manager of the plant. As vice-president in charge of technical production and because¹⁷⁰ of your extensive practical knowledge, the chairman of the board also requests your presence. Very truly yours, (340)

My dear Subscriber:

The time has come for us to send you this notification that your subscription to the²⁰ Practical Photographer will expire in a few weeks. May we ask that you forward your check soon to assure your not³⁰ missing a single issue. Yours truly, (47)

For Use with Chapter Twelve

Dear Mr. Bradford:

As you requested, I have designated one of our

salesmen familiar with the Atlantic²⁰ Coast territory to inspect the warehouses about which our wholesalers have been complaining. He will³⁰ investigate our warehouses in Boston, Massachusetts; Rochester, New York; Jersey City, New Jersey; Atlanta,⁴⁰ Georgia; and Miami, Florida. His name is John Richfield, Jr.

Headquarters' verdict is that Mr.⁵⁰ Richfield is an energetic salesman, with keen powers of observation. Three abstracts from his reports⁶⁰ accompanying this letter are significant, in that they obviously indicate a thorough grasp of the⁷⁰ administration of our warehouses and the practical needs of our wholesalers.

If Richfield succeeds in fulfilling⁸⁰ this assignment with distinction, we can negotiate his transfer to the Pacific Coast, where he can assist⁹⁰ in the investigation of our freight difficulties.

Please let me know if this meets with your approval.¹⁰⁰ Yours truly, (182)

Dear Mrs. Stone:

I am afraid that a civil suit concerning the terms of your late husband's will is unavoidable.²⁰

As you know, there has been an exchange of correspondence with your brother-in-law, Mr. Mansfield, now a³⁰ bookkeeper at the American Institute of Commerce. He claims that legislation recently passed by the⁴⁰ legislature of the State of New Jersey entitles him to a major share of the estate. I have tried to⁵⁰ convince his attorney of the wisdom of negotiation, but have been disappointed.

Mr. Mansfield was⁶⁰ offered the English property, as you suggested, but it seems that in his mind there is no substitute for⁷⁰ litigation. In all probability he will institute legal proceedings about two weeks after Christmas.⁸⁰ While I dislike to disturb you, as the principal defendant concerning the text of the will, your authoritative⁹⁰ testimony will be indispensable.

Knowing how you wish to avoid coming down to our corporation¹⁰⁰ offices on Constitution Avenue, I am sending a messenger with a parcel containing¹¹⁰ an affidavit for your signature. Very sincerely yours, (211)

Transcription Practice

Dear Mr. Ainsworth:

Everyone wants a radio that won't become an "orphan" and yet the odds are 6 to²⁰ 1 that the average buyer may choose just such a set.

Look at these figures if you don't believe it: In the³⁰ period between 1922 and 1939, 886 different⁴⁰ brands of radio receiving sets were offered to the public, according to authoritative reports. Yet⁵⁰ 742 of them were discontinued by 1940!

Not everyone who bought⁶⁰ an orphan set regretted it, of course; but nearly all of them had undue trouble and expense in getting repairs⁷⁰ or service. And certainly they enjoyed little pride of ownership.

Now, for a moment, consider Atlas.⁸⁰ Among the leading brands of radio and radio-phonograph sets is the one bearing our name—Atlas—a⁹⁰ name we are proud of, a name that is the trade-mark of a \$50,000,000 institution well known the world¹⁰⁰ around, a leading manufacturer of radio sets for twenty-two years.

In choosing an Atlas you will¹¹⁰ be exercising



Identic Practice Filing Sets

pull your costs Down!

The durability of Remington Rand *Identic* practice filing sets pulls down equipment costs in schools everywhere.

For example, note the Card Index and the Variadex Alphabetic Correspondence Index above which are recommended for a 20-period course. The trays are made of well-seasoned, carefully-worked wood, while the indexes are of the same durable materials used day after day in actual business filing.

In most schools they outlast practice by hundreds of students, and in a decade their cost is less than one cent per student!

With *Identic* sets you also receive eight teaching aids that save you time and help you in visual instruction, testing, and grading.

What One Teacher says:

"Our Remington Rand *Identic* practice sets stand up under the constant use that they must receive.

"We have enough equipment to give the full course to about 150 students each year. Much of it was purchased from 10 to 15 years ago, and we have some sets that have been in use more than 21 years.

"They are still not only usable but are in good condition." —Miss Harriet I. Flagg, Teacher of Office Practice, Waltham (Mass.) High School

The coupon below will bring you full details without obligation. Why not send it *now*?

MAIL This Coupon TODAY	AMERICAN INSTITUTE OF FILING	Remington Rand	315 FOURTH AVE NEW YORK 10, N Y
	<input type="checkbox"/> Vertical Filing <input type="checkbox"/> Visible Records	Miss N. Mae Sawyer: Please send me free literature and all the facts on Remington Rand Practice Methods of Teaching and Identic sets.	
		Name _____ Street _____ School _____ City _____ State _____	

For more information you may wish to use the check-coupon on page 248.

good judgment in your radio purchase, assuring yourself long listening pleasure, true²⁰⁰ satisfaction—all your money's worth! Very truly yours, (229)

Dear Mr. Jackson:

The ability to speak before groups may make the big difference in your life!

—because, when²⁰ you combine the sound thinking and practical vision of a seasoned executive with the mastery of putting⁴⁰ ideas across by effective speaking, there just can't be any ceiling on what may be accomplished.

Think,⁴⁰ for example, how much it would immediately increase your value in business or in social contacts, to⁸⁰ be able to stand up and speak your mind dynamically before any group. How your prestige, influence, and¹⁰⁰ leadership would gain recognition.

You'll be delighted to find how easy and enjoyable it is to become¹²⁰ an able speaker by our method for business executives—it takes surprisingly little time, and you¹⁴⁰ will get "a real lift" seeing yourself improve day by day.

Our field counselor, Mr. J. L. Able, will gladly¹⁶⁰ give you details about our method.

While it's fresh in your mind, why not mail back the enclosed card? You'll surely profit¹⁸⁰ by a talk with Mr. Able. There's no obligation whatever. Cordially yours, (196)

Actual Business Letters

Miss Frances Walsh
The Concord Publishing Company
1416 Main Street
Concord 4, New Hampshire

Dear Miss Walsh:²⁰

The enclosed 1946-47 season Wholesale Trade Price List is our bid to let us handle⁴⁰ your miscellaneous subscription clearances. We know you will be pleased with the service rendered.

"Service rendered"⁶⁰ is the foundation upon which the Sandlock Magazine Agency constantly is building, and for which it⁸⁰ is receiving nationwide recognition. Our clearing service is prompt—even during the Christmas rush—all¹⁰⁰ subscription orders are on their way to the publishers within forty-eight hours after receipt in our office.

Will¹²⁰ you please give this copy of our catalog to the person who is responsible for the clearing of¹⁴⁰ miscellaneous subscription orders for your office and suggest that they try Sandlock's service? Yours truly, (158)

Mrs. Alice S. Clark
319 Riverside Drive
New York 14, New York

Dear Mrs. Clark:

The time has come for²⁰ us to tell you that your subscription expires with the *next issue*.

Not so long ago we notified one of our⁴⁰ readers that his subscription was about to expire. "You are wrong," he wrote back, "My subscription is not about to⁶⁰ expire—it is about to be renewed!"

Will you reply to us as pleasantly as did this reader, by marking⁸⁰ your instructions on the handy renewal form enclosed?

With the lowest rates in our history again in effect,¹⁰⁰ you will save money by renewing your

subscription now, and save even more by sending our magazine as¹²⁰ your Christmas gift to friends or relatives.

This Christmas your own renewal will cost you only \$2.75.¹⁴⁰ Additional subscriptions are only \$2.25 per year.

It is so easy to¹⁶⁰ give your friends and relatives this lasting pleasure at modest cost. Your Christmas shopping is quickly done, in the comfort¹⁸⁰ of your home. We do all the wrapping and shipping and send an attractive gift card, inscribed with your name, to announce²⁰⁰ each gift.

Simply indicate your instructions now on the convenient renewal form enclosed, and mail it today.²²⁰ Send no money unless you prefer to. We shall not even mail you a bill until after January²⁴⁰ 1.

Best wishes for a Merry Christmas! Sincerely, (249)

Education Pays Off

SPEAKING OF EDUCATION, the Census Bureau has some interesting statistics on the comparative value²⁰ of a college education as related to earning power. Sixty per cent of the group of men in this⁴⁰ country who earn \$5,000 or more each year are college men, 35 per cent have had high school training⁶⁰ and only five per cent completed eighth grade or less. At the other end of the scale, only five per cent of the⁸⁰ men earning \$1 to \$499 are college men; 25 per cent in this group have¹⁰⁰ had high school education; and 70 per cent have had primary-grade training only.—*The Advertisers*¹²⁰ *Digest*. (121)

THERE is no advancement to him who stands trembling because he cannot see the end from the beginning.—E. J. Klemme (20)

Not for Skill Alone

(Continued from page 217)

help the student adjust to the job when he displays the "old-fashioned virtues" of industry, interest in the work and the firm, loyalty to the employer, and a constructive attitude.

In business education, much of the instructor's time is spent in training for skill alone. Too often the student is not sufficiently aware of the importance of these other aspects of life in the business office.

The training of workers who can adjust to a particular work situation because they have adjusted personalities, will do much to promote and maintain a co-operative spirit between the school and the employer. When training in mental hygiene and personality development, as well as skills, are included in business courses, the student will be prepared not only to make a living but also to live—the purpose of education in a democracy.

3 New Firsts in Typing!

- ① A 5-Assignment Skill-Building Cycle.
- ② Business-Letter Content for All Speed-Building Copy and Timed Writings.
- ③ Vocabulary Drills Based on the Horn-Peterson List of Most-Used Business Words.

Typing for Business gives you a new way to teach typing through new FIRSTS in typing. Basic skill is developed by means of applications! Real business typing jobs are broken down into their major parts. By means of a 5-assignment skill-building cycle, used for the *first time* in a typing text, each part is taught intensively and then the parts are put together in a finished product. The use of business typing jobs and the Horn-Peterson list of most-used business words for content—*both new firsts* in typing—results in a direct transfer of typing vocabulary to production on the job.

Examine the new FIRSTS in *Typing for Business*. Five books comprise the series—a text for every teaching situation. Write our nearest office.

TYPING *for* BUSINESS

by BLANCHARD and SMITH

The GREGG PUBLISHING COMPANY

NEW YORK

CHICAGO

SAN FRANCISCO

BOSTON

DALLAS

TORONTO

LONDON

For more information you may wish to use the check-coupon on page 248.



ON THE LOOKOUT

A. A. BOWLE

19 Into your pocket will fit the new postage scale announced by the Southwestern Household Equipment Company. It weighs mail from 1 to 4 ounces. Design permits folding flat into thin leather case.

20 It's all in a nut shell! The Findit filing system is attractively packed in one unit, containing tab guides, corresponding miscellaneous folders, Duratex folders, colored labels, and a name guide with colored tab. This unit is designed to meet the needs of a small filing system.

21 The Bankers Box Company offers a new addition to its line, the Liberty copyholder. The new copyholder is all-metal and is declared to be practical for use by stenographers, typists, billers, and checkers.

22 New Scratch Paper-Pencil Holder is announced by The Pierce Company, for use in the office and school. It is made in two styles, the desk model, 3 by 5 inches or 4 by 6 inches. The wall model is available in the same sizes and is equipped with a hole for hanging.

23 The Wells Office Furniture Company is offering a new hardwood typewriter and office-machine table, available in a walnut finish and in a golden-oak finish.

The table measures 18 inches by 22 inches, is 26 inches high, and has 1½-inch square legs. The top, ¾ of an inch thick, is made of hard alder wood. This is model No. 601.

24 Tel-Eze, a streamlined, snap-on telephone index is being offered by The Le-Shore Corporation. This index is made so that it can snap on any type of desk phone. It can be attached and removed without the use of tools. The device is equipped with cards and pencil and is made of strong, noninflammable plastic.

25 The Wolber Duplicator & Supply Company has announced that the Master Copy-Rite Duplicator is once more back on the market, after serving the Army and Navy during the war. This duplicator has a visible fluid supply that gives an even flow of liquid to the moistening rollers. With a turn of the handle, your copy is produced, face up. This machine is equipped with an automatic, nonslip paper feed to eliminate spoilage.

A. A. Bowle

December, 1946

The Business Education World

270 Madison Avenue, New York 16, N. Y.

Please send me, without obligation, further information about the products circled below:

19, 20, 21, 22, 23, 24, 25

Name

Address

I would also like to know more about:

- ☐ Gregg's *Functions of Business*.....(front cover)
- ☐ Burroughs' business machines.....(page i)
- ☐ Esterbrook's shorthand pens.....(page ii)
- ☐ Remington-Rand's practice filing sets.....(page 245)
- ☐ Gregg's *Typing for Business*.....(page 247)
- ☐ Hadley's Pathfinder practice sets.....(back cover)
- ☐ IBM's Electromatic Typewriter.....(back cover)